



DRIVE | LIVE | ACCESSORIZE



# WELCOME

to the world of DICE

**D**ICE Electronics has been an industry leader in OEM vehicle integration for years. Our commitment to quality drives us to continuously develop cutting edge devices that meet and push toward the next steps in the quickly evolving vehicle technology market. We concentrate our expertise on engineering and design.

**I**nvesting into new emerging technologies through in-house engineering, technology licensing, and partnerships has contributed to our success over the years. We stand strong and will continue to lead the integration market by increasing resources and recruiting talented managers and engineers.

C oming to your home is our new line of home audio products. Due to their success, we continue to develop and add new and unique features to the units. The iTPA 220 and iTR 100 both provide great sound quality and their classic design will accent any home or office decor.

E volving into a new era of manufacturing, we value the concept of maintaining our surroundings and pride ourselves in using eco-friendly designs in packaging and component selection. Our US based engineering, design, and marketing teams enable us to forward the same value to our business partners. We focus on providing professional support, incentives, and care to all of our customers.

# TABLE of CONTENTS

## Vehicle Specific Integration for iPod

4

• Acura .....	8
• Audi .....	14
• BMW / Mini Cooper .....	20
• Honda .....	26
• Lexus .....	32
• Mazda .....	38
• Mercedes .....	44
• Porsche .....	50
• Scion .....	56
• Toyota .....	62
• Volkswagen .....	68

### Universal Integration for iPod

• AUX universal integration .....	74
• FM-RDS universal integration .....	76

### Accessories

• Integration accessories for iPod .....	82
------------------------------------------	----

## Home Audio

84

• iTR-100 desktop HD radio receiver .....	86
• iTPA-200 vacuum tube amplifier system for iPod .....	88

### Terms and conditions

The content of this catalogue is provided "as is" under the following terms and conditions.  
 DICE Electronics, LLC. (herein "DICE") believes that all information contained within are correct and true, however accepts no responsibility for the accuracy, completeness or timeliness of the information published or otherwise stated.  
 Information contained within including but not limited to compatibility guidelines are not a guarantee of suitability, performance, merchantability, or fitness. Diagrams, FAQs and tips are provided for educational purposes only, not guaranteed to be error free, and are intended to assist skilled professionals with proper experience.  
 No warranty, express or implied, and no liability in connection with the use of the information contained in this catalogue shall be assumed by DICE. You further agree that DICE is not liable for any direct, indirect, incidental, consequential or punitive damages arising out of the use of this catalogue or any DICE products. This catalogue does not contain any guarantee or agreed quality of DICE products or any warranty and non-infringement.  
 DICE shall not be held responsible for alleged misrepresentation or other wrongful practices of its dealers, distributors, or installers. DICE's obligations and responsibilities regarding its products are governed solely by the agreements under which they are sold. Information contained herein does not become part of these agreements.  
 This catalog, as a whole or any sections of it may not be modified or copied for commercial use or distribution. All content, including but not limited to line art, illustrations, logos, images, pictures, graphics, remarks, notes and texts in this catalogue whether printed, published on the internet or contained in electronics format are subject to copyright and other intellectual property rights of DICE Electronics, LLC. and/or its affiliates. Copyright law governs the use of trademarks and copyrighted content; any unauthorized use without written consent from DICE or misuse shall constitute a violation of the law, and may be subject to prosecution. All images are for illustration purpose only.  
 DICE, at its sole discretion, may revise the information contained herein at any time with or without notice.  
 The use of this catalog constitutes your acceptance of these terms and conditions.

Copyright © 2008 DICE Electronics, LLC. All rights reserved.

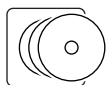


# integration for iPod Vehicle Specific

## Digital In Car Entertainment

The vehicle-specific car integration kit for iPod connects the iPod to the vehicle's factory entertainment system. The interface provides CD-quality sound and creates a seamless interconnection between iPod and the entertainment system of the vehicle. Text display is available on radio systems where CD or SAT text is supported. The interface also features integrated controls from the radio, steering wheel or the iPod and always keeps the iPod charged and ready to go.

## Features



**CD-Quality Audio**  
Delivers high-fidelity CD-quality audio output from your iPod to your factory car stereo.



**iPod-like Browsing**  
Browse through all the available content like you would on your iPod



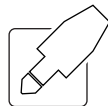
**Integrated Controls**  
Allows you to control music from your iPod, or radio and steering wheel controls.



**Charges iPod**  
Always keeps your iPod charged and ready to go.



**Text Display**  
Displays the song title, album and artist name right on the screen of your radio.



**AUX Input**  
Connect any external audio device including: aftermarket satellite radio, CD/DVD players and more.

## Specifications

**Note:** It is recommended that installation leaves module accessible to end-user.

- Designed and manufactured in the USA
- Storage temperature: 0-150F
- Standby current consumption: ~25mA
- Operating ambient temperature: 30-120F
- Maximum current consumption: ~1A

## iPod/iPhone Ecosystem



**iPod**  
4th generation  
20GB 40GB  
12 Volt / 5 Volt



**iPod classic**  
80GB, 160GB:12 Volt / 5 Volt  
120GB: 5Volt



**iPod mini**  
4GB 6GB  
12 Volt / 5 Volt



**iPod touch**  
1st gen (5 Volt/12Volt)  
8GB 16GB 32GB  
2nd gen (5 Volt)  
8GB 16GB 32GB



**iPod**  
4th generation (color display)  
20GB 30GB 40GB 60GB  
12 Volt / 5 Volt



**iPod nano**  
1st generation  
1GB 2GB 4GB  
12 Volt / 5 Volt



**iPod nano**  
3rd generation (video)  
4GB 8GB  
12 Volt / 5 Volt



**iPod**  
5th generation (video)  
30GB 60GB 80GB  
12 Volt / 5 Volt



**iPod nano**  
2nd generation (aluminum)  
2GB 4GB 8GB  
12 Volt / 5 Volt



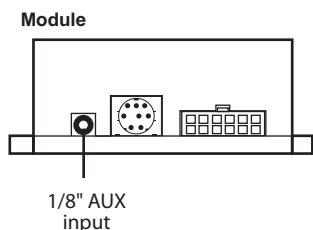
**iPod nano**  
4th generation (video)  
8GB 16GB  
5 Volt only



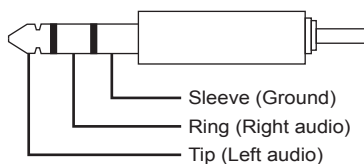
**iPhone & iPhone 3G**  
4GB 8GB 16GB  
5 Volt

## Auxiliary Audio Source

The interface is equipped with a 1/8" AUX jack to connect an auxiliary device such as an MP3 player, DVD player or other audio sources. To access the AUX audio source, select DISC 5, Track 2 or Mode 5, Channel 2.



1/8" mini stereo jack (not included)

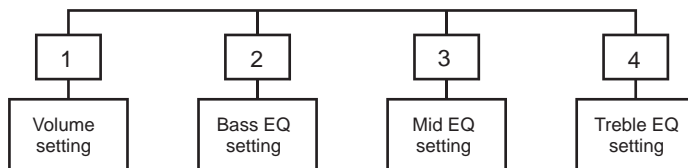


Making the adjustments:

While listening to the auxiliary device, adjust the volume (gain), bass, mid and treble by turning the Tune dial or pressing the Seek button. DISC/Mode 1-4 modes select what adjustment the Tune/Seek buttons perform. See next page for illustration.

The auxiliary input has settings for gain, bass, mid and treble in order to optimize sound.

Volume (Gain) should be adjusted if the audio level from the auxiliary device is too low or to high. If you hear distorted audio while playing the auxiliary device, you need to reduce (-) the gain. If you notice that the audio is too quiet then the gain setting should be increased (+). Default settings are "50" ("68" for gain) and values may be adjusted in increments between 01-99. Bass, Mid and Treble should be adjusted to compensate for the acoustic presets of the radio.



Note:

If you are using an AUX device that uses the vehicle's power source and not its own battery, you may have to use a GROUND-LOOP isolator to avoid grounding and engine noise.

## Comparison Chart

The vehicle specific, hard-wired integration kit from DICE is packed with features. Compare it to any other product on the market and see for yourself how great it is. Our kit offers CD-quality sound, text display, integrated controls, iPod like browsing and much more!

Features					
CD quality sound	✓	✓	✓	✓	✓
AUX input	✓	✓	✓	✓	✓
Full text display	✓			✓	
Customizable text display	✓				
Full control from radio, steering wheel, or iPod.	✓	✓	✓	✓	
Browsing by playlist, artist, album, and song	✓				
Switchable, functional iPod Screen	✓	✓	✓	✓	
Vehicle-specific	✓	✓	✓	✓	✓
Charges iPod (both 5 volt & 12 Volt)	✓			purchase separately	
Optional iPod holder/cradle	✓				

\* Comparison data based on products available as of Summer, 2008. Information listed is as-is. DICE Electronics is not responsible for any misprints or the accuracy of the data.

## FAQ for iPod integration

### **Will my factory radio support text display?**

Yes, select CD-text and/or SAT capable radios can support text display.

### **Do I have to disconnect the CD changer in my vehicle?**

Externally mounted CD-changers (glovebox, trunk, etc.) need to be disconnected. In-dash CD changers built-in to the radio however, are retained.

### **Can I keep the factory satellite radio in my vehicle?**

Yes, various operating modes are supported with the DICE integration kit to allow for the most flexible install. See specific kits for more details.

### **Do I need to have a navigation radio to be able to operate the kit?**

No, non-nav and navigation head units are both supported.

### **Will the DICE integration kit charge my iPod/iPhone?**

Yes, all iPod models and iPhone models are supported for charging, including the latest 5 volt iPod/iPhone models.

### **Can I use older iPod kits with my new iPod?**

While control and music are available from older integration kits, they will only provide 12 volt charging which is no longer supported by new iPod models. New iPod cables are available for 5 volt charging.

### **Can I keep the iPod controls active?**

Yes, the iPod can be controlled directly if the DICE unit is set up in iPod mode. In this mode, text display may not be supported.

### **Which iPod does the kit work with?**

4th generation and newer models (excluding Shuffle) are supported.

### **Can I install the kit myself?**

Yes, the kit is end-user installable with the proper tools. However, we do recommend professional installation.

### **Will the kit direct my phone call through the car radio?**

No, however the iPhone will pause the music for the duration of the phone call and resume once the call has ended.

### **It appears that the DICE kit uses the same mini-din connector for the iPod dock cable as other kits. Can I use an iPod cable from another 3rd party system?**

No. While cables may appear identical, the internal connections can be very different. Using a non-DICE branded cable can damage both the integration kit and the iPod.

### **What makes the DICE iPod integration kit different from others available on the market?**

Our kits offer multi-source integration (can operate as CD/MP3/MD/SAT), text display on various vehicles, user-friendly interface, and more!

### **In any way can the DICE kit void my vehicle manufacturer's warranty?**

No, when the DICE kit is properly installed and operated, the vehicle's warranty will not be voided.

### **If my vehicle has a CD-changer connection in the glovebox, can it be utilized for DICE integration for iPod?**

For most vehicles, the glovebox connection can be used to integrate the DICE kit.

### **What does "made for iPod" logo mean?**

The MFi logo can only be used by Apple licensed product developers who certified the product to comply with guidelines set by Apple. Only licensed developers have access to authentic dock connectors that ensure the highest quality connection and longest reliability.

### **What does the "works with iPhone" logo mean?**

The WWi logo is an extension of the MFi program with even tougher certification requirements ensuring interference-free operation with iPhone.

### **Will the DICE kit support video playback on my navigation screen?**

No, our iPod kit can only transfer the audio and information for the audio through your stereo system.

# ACURA



Integration for iPod





# ACURA

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits				Universal Kit
<b>Acura</b>	<b>iPod CDC Kit</b>	<b>CDC Note</b>	<b>iPod SAT Kit</b>	<b>SAT Note</b>	<b>iPod FM Kit</b>
Integra					
1998 - 2001	i-Honda-R2	3	N/A		FMRDS
MDX					
2005 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	1, 2	FMRDS
2001 - 2004	N/A		N/A		FMRDS
RDX					
2007 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	1, 2	FMRDS
RL					
2005 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	1, 2	FMRDS
1996 - 2004	N/A		N/A		FMRDS
RSX					
2002 - 2006	i-Honda-R2	3	N/A		FMRDS
TL					
2004 - 2008	i-Honda-R3/R4	1	i-Honda-R3/R4	1, 2	FMRDS
1998 - 2003	N/A		N/A		FMRDS
TSX					
2004 - 2008	i-Honda-R3/R4	1	i-Honda-R3/R4	1, 2	FMRDS

Note:

- The DICE i-Honda-R series supports both Honda and Acura vehicles, therefore the part numbers are shared (i-Honda-R2, i-Honda-R3/R4).
  - Text display not available in CDC mode.
1. Navigation-equipped vehicles or factory satellite retention requires i-Honda-R4 kit.
  2. Text available only in SAT emulation mode - Radio must have XM button and factory XM must be disconnected.
  3. Not compatible with in-dash 6 CD system; external CD-changer must be disconnected.



Acura

## FAQs Before Purchasing the Kit

### How can I tell if my factory Acura radio will support text?

The factory radio must have an XM or SAT button.

### Can the factory XM be retained?

Yes, factory XM can be retained with our Y-harness that is included in the i-Honda-R4 kit. Retaining XM requires the kit to be in CDC emulation mode.

### Are any of the operational features different between SAT-mode and CD-mode of the DICE unit?

Operating the iPod through the factory radio is nearly identical in both emulation modes. SAT-mode has the benefit of text display.

### Can the steering wheel controls operate my iPod?

Yes, the steering wheel controls can operate the iPod. Note: pressing and holding of the steering wheel button triggers its secondary function.

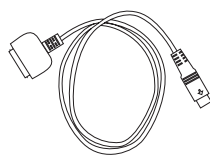
## Content Identifier



user manual

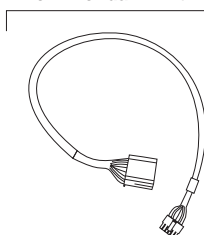


vehicle specific interface module



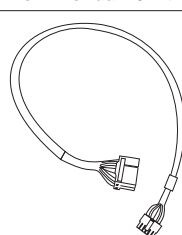
docking cable

for i-Honda-R2 kit:



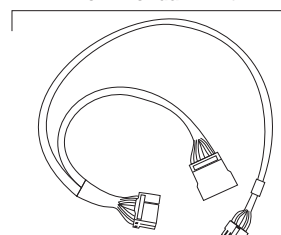
Honda-R2  
Bus Connector

for i-Honda-R3 kit:



Honda-R3  
Bus Connector  
(regular harness that is used  
for non-nav Acura and  
disables XM (if equipped))

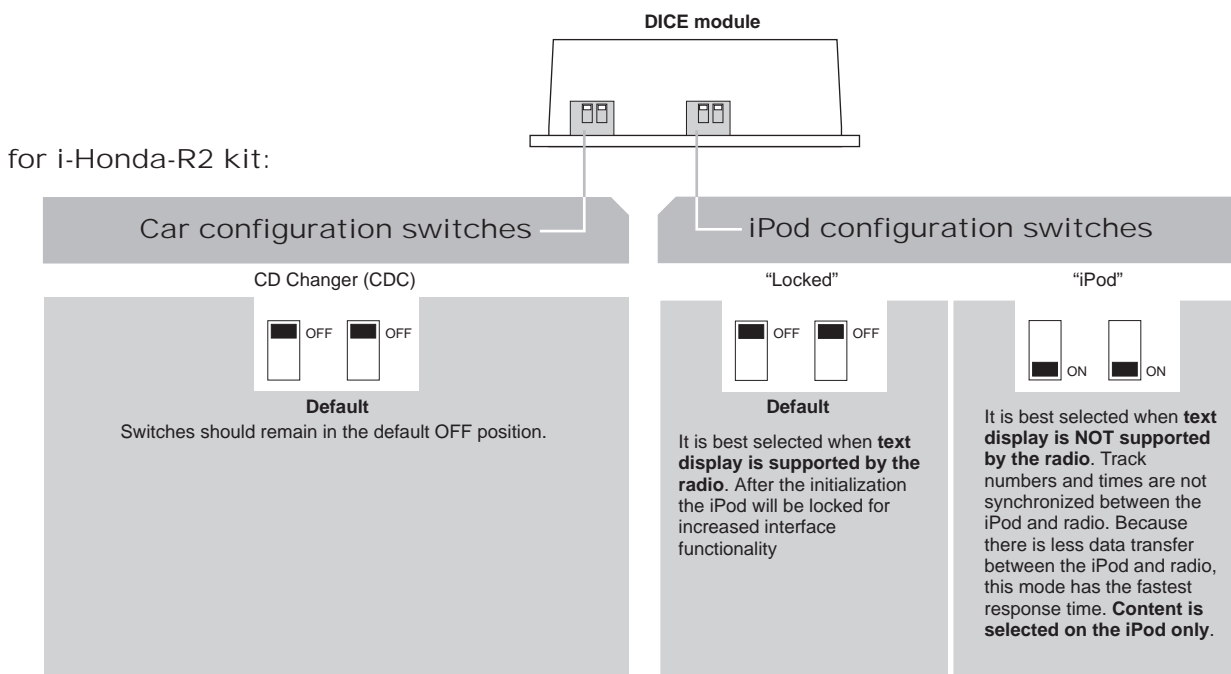
for i-Honda-R4 kit:



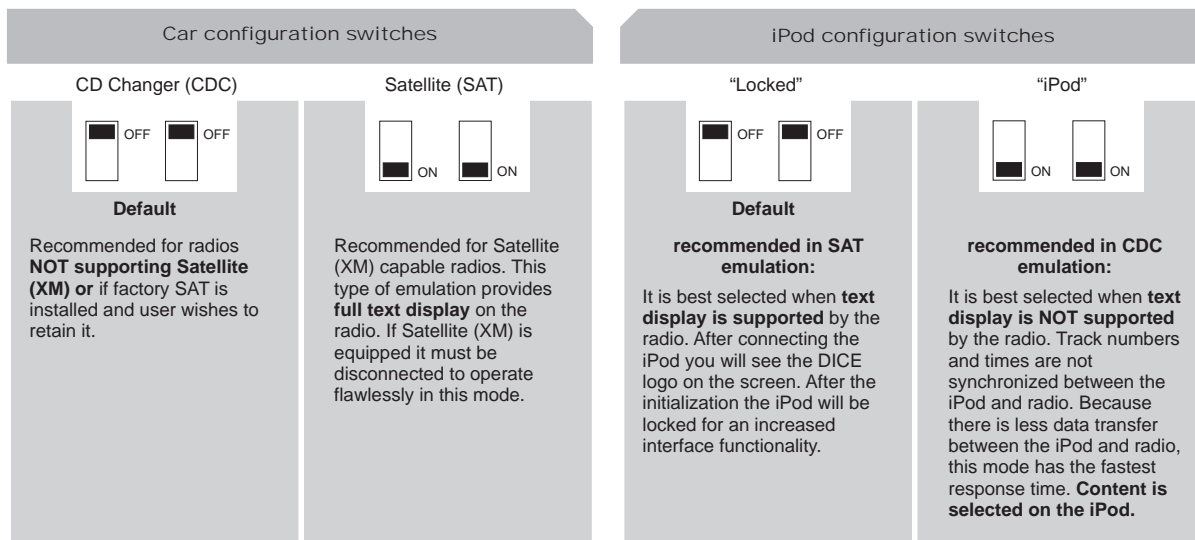
Honda-R4  
Bus Connector  
(Y-harness required for  
navigation-equipped Acura or to  
retain factory XM)

## About Dip Switch Settings

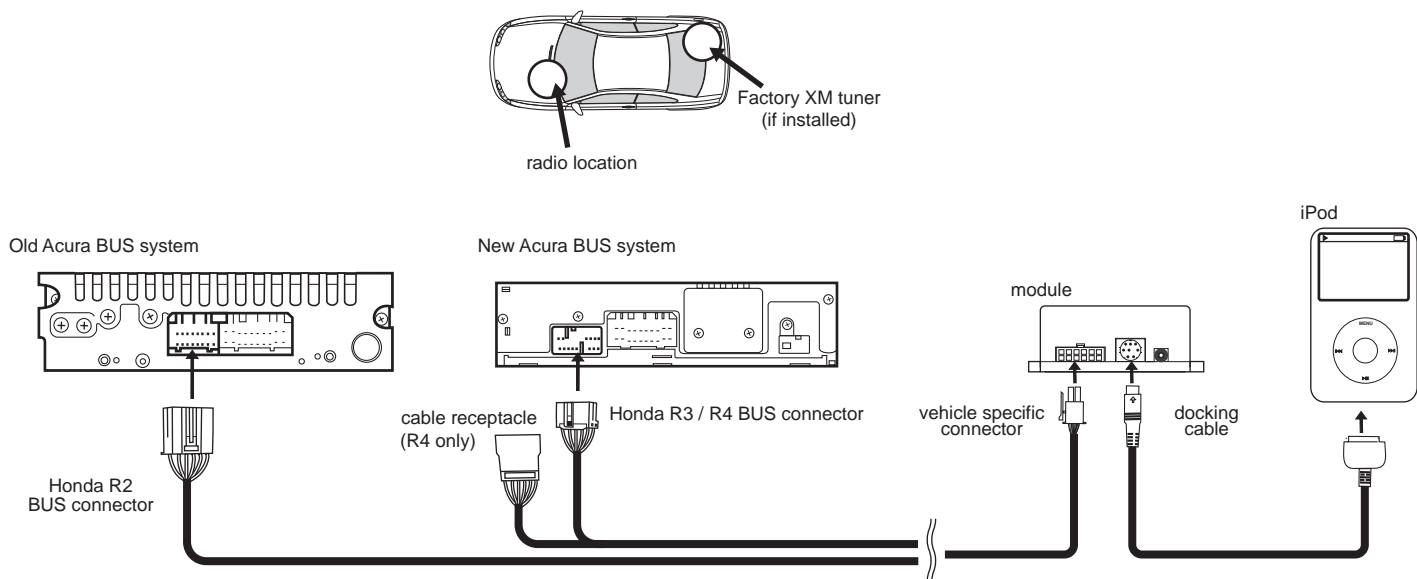
The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



## for i-Honda-R3/R4 kit:



## Connection Diagram



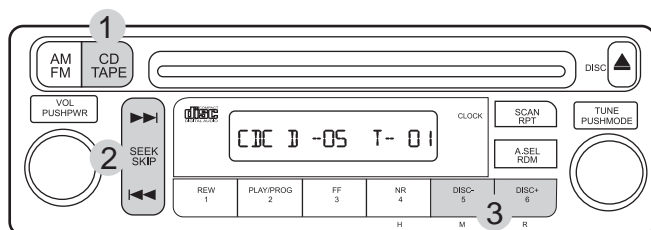
- Note that in some vehicles the physical location of the CD changer / SAT connector is on the bottom of the radio

## Installation Tips / Check List

- ☐ To operate in SAT mode, the XM tuner must be physically disconnected. The tuner is usually located in the trunk area on the left or right side near the wheel-well. In the Acura RDX, it is behind the glovebox up front.
- ☐ Installation on the Acura TSX can be done without removing the radio. Simply press the inner sides of the storage bin of the lower part of the dash and gently pull out. The CD/SAT connection is on the bottom of the radio; this is where the i-Honda-R3/R4 will connect.
- ☐ On the Acura TL (2004-2008), the radio normally does not need to be removed. When the driver-side panel on the console is removed, you can get to the CD/SAT connection through the side.

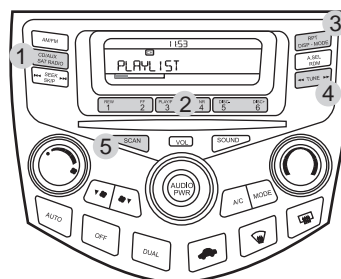
## Operation Overview

### CDC emulation



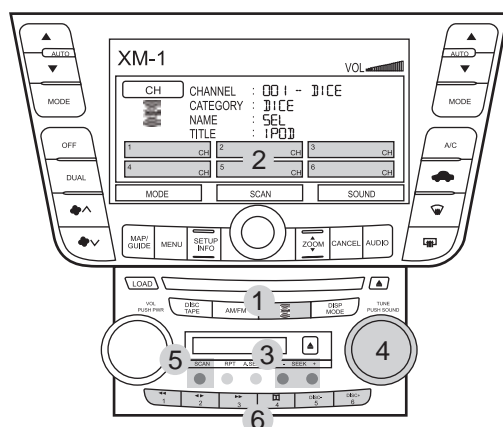
- 1 Source selector
- 2 Press to change track, press and hold to RW or FFW.
- 3 Press to change modes.

### SAT emulation



- 1 Source selector
- 2 Use Presets to change modes.
- 3 Toggle between available text fields.
- 4 Press to change track.
- 5 Press to enable shuffle song.

### SAT emulation with navigation system



- 1 Source selector
- 2 & 6 Use Presets to change modes.
- 3 Press to change track.  
or
- 4 Turn to change track.
- 5 Press to enable Shuffle Song.

## Acura Specific Technical Notes

Problem	Solution
Cannot fit i-Honda-R2 kit into any of the ports on the radio or cannot fit i-Honda-R3/R4 into any of the ports on the radio	Various vehicle trim models (EX, LX, DX, etc.) can have different radios for a specific year. If the i-Honda-R2 connection doesn't fit into any ports, the i-Honda-R3/R4 will be required and vice versa.
iPod does not display the DICE logo when connected.	Reset iPod and make sure most recent iPod firmware is installed. Make sure all cables are connected properly. Note that iTouch does not display the logo.
Cannot select CD changer or SAT source.	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface.
Radio/ steering wheel controls do not operate iPod.	Reset iPod and make sure most recent iPod firmware is installed.
No text display.	Make sure DIP switch settings are correctly set for text display.
No audio from iPod source.	Reset the iPod. Verify proper connection to the interface.
iPod does not charge.	Check all connections. See if iPod charges while connected to computer or wall charger. You may need to reset the iPod.
Music is distorted or sound level is too low.	Check and make sure all EQ and BASS boost options are turned off on your iPod.
Cannot find SAT mode.	If the radio does not have a SAT or XM button, then it will not support SAT emulation of the DICE module. Have the DICE module configured for CDC emulation.
Sound of factory installed satellite radio is bleeding through when the iPod audio source is selected.	The factory XM module must be disconnected. It is usually located in the trunk of the vehicle.

# AUDI



Integration for iPod





# AUDI

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits				Universal Kit
Audi	iPod CDC Kit	CDC Note	iPod SAT Kit	SAT Note	iPod FM Kit
A3					
2008 - 2009	i-VW-R	2, 3	i-Audi/VW-SAT	4, 5	FMRDS
2006 - 2007	i-Audi-R	1, 2	i-Audi/VW-SAT	4, 5	FMRDS
A4/S4/RS4					
2009	N/A		N/A		FMRDS
2007 - 2008	i-VW-R	2, 3	i-Audi/VW-SAT	4, 5	FMRDS
2004 - 2006	i-Audi-R	1, 2	i-Audi/VW-SAT	4, 5	FMRDS
1998 - 2004	i-Audi-R	1, 2	N/A		FMRDS
A5/S5					
2008 - 2009	please call		N/A		FMRDS
A6/S6/RS6					
2005 - 2009	N/A		N/A		FMRDS
2004	i-Audi-R	1	i-Audi/VW-SAT	4	FMRDS
1998 - 2003	i-Audi-R	1	N/A		FMRDS
Q7					
2007 - 2009	please call		N/A		FMRDS
A8/S8					
2002 - 2009	N/A		N/A		FMRDS
1998 - 2001	i-Audi-R		N/A		FMRDS
Allroad					
2004 - 2005	i-Audi-R	1	i-Audi/VW-SAT	4	FMRDS
2000 - 2003	i-Audi-R	1	N/A		FMRDS
TT					
2008	i-VW-R	2, 3	i-Audi/VW-SAT	4, 5	FMRDS
2004 - 2006	i-Audi-R	1, 2	i-Audi/VW-SAT	4	FMRDS
2000 - 2003	i-Audi-R	1, 2	N/A		FMRDS

Note:

- Text is not supported on i-Audi-R & i-VW-R kits.
1. If the vehicle is equipped with the factory navigation system (RNS-E), please choose the i-VW-R kit.
  2. Optional mating connector available if glove box CDC plug connection is present. This also retains factory SAT radio.
  3. If the vehicle requires i-VW-R kit, please contact us for detail on SAT retention.
  4. Radio must have a SAT button.
  5. i-Audi/VW-SAT kits allow for retaining factory SAT tuner, if present.



## FAQs Before Purchasing the Kit

### Does factory satellite radio need to be disabled with the DICE kit?

No, the i-Audi/VW-SAT kit retains factory satellite radio.

### How can I tell if my Audi radio will support the text-capable i-Audi/VW-SAT kit?

If your factory Audi radio has a SAT button, it is compatible with our i-Audi/VW-SAT kit and will support text display.

### I upgraded my older Audi's factory radio to a newer factory radio/navigation. Will this still work and how do I know which kit I need?

This will still work as long as the newer head unit came out of a compatible Audi. Navigation (RNS-E) radios take the i-VW-R harness. Other radios may need to be verified for CD Changer/SAT connection.

## Content Identifier



user manual

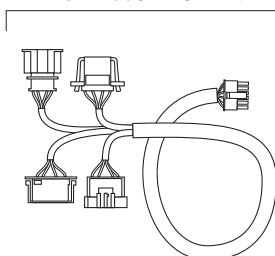


vehicle specific interface module



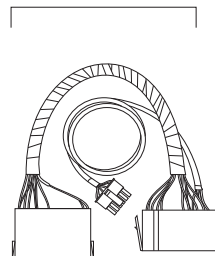
docking cable

for i-Audi/VW-SAT kit:



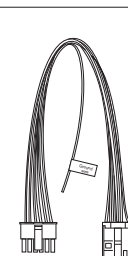
i-Audi/VW-SAT harness

for i-Audi-R kit:



Audi-R harness

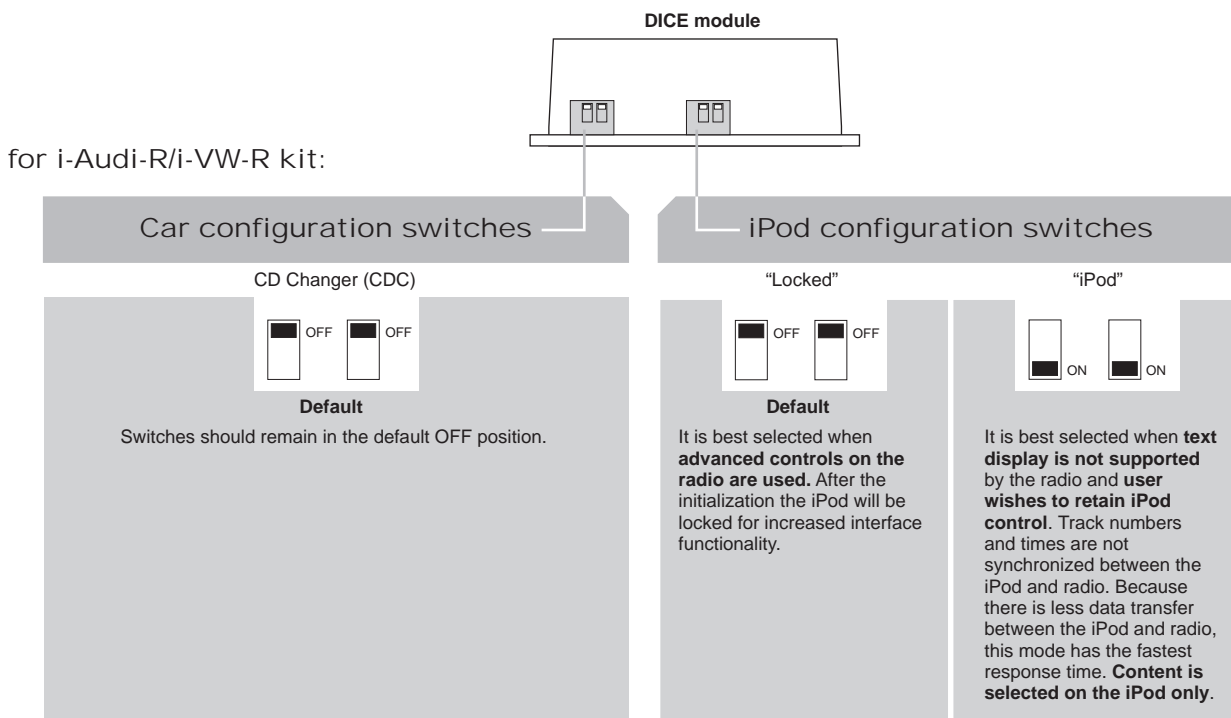
for i-VW-R kit:







VW-R2 harness

## About Dip Switch Settings

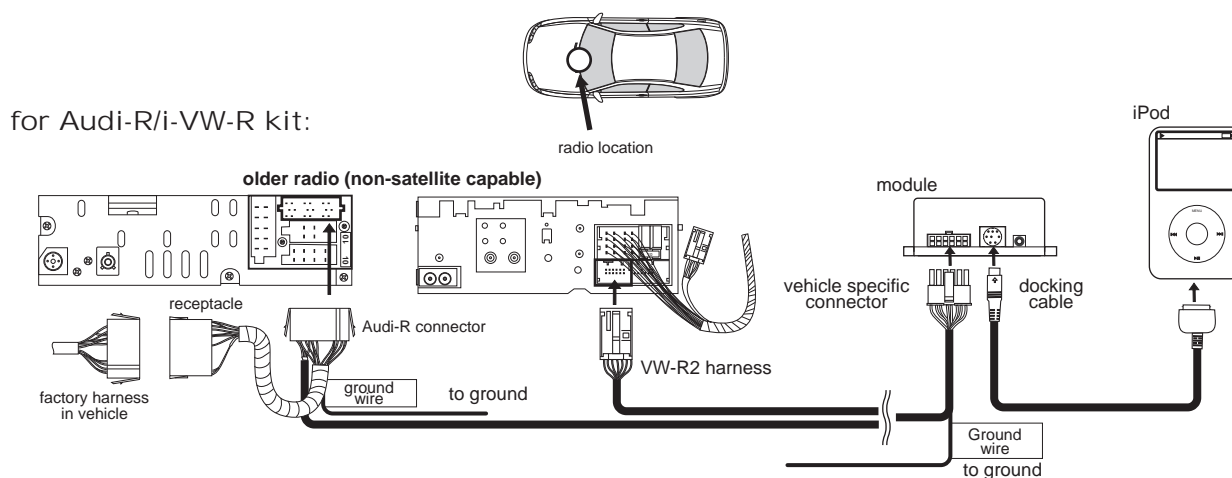
The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



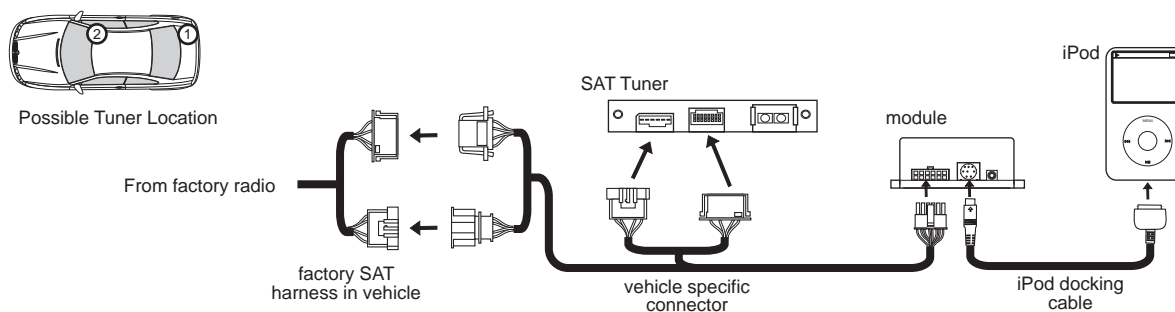
## for i-Audi/VW-SAT kit:

Car configuration switches		iPod configuration switches	
<b>Multi-line display</b>	<b>Single-line display</b>	<b>"Locked"</b>	<b>"iPod"</b>
			
<b>Default</b> This is the recommended setting for <b>radios that have multiple text fields displayed in Satellite emulation mode.</b>	This setting is recommended for <b>radios where there is only one text field displayed in Satellite emulation mode.</b>	<b>Default</b> This is best selected when <b>text display is supported</b> by the radio. After connecting the iPod you will see a logo or a checkmark indicating that the iPod is locked. After the initialization the iPod will be locked for increased interface functionality.	This is best selected when <b>text display is NOT supported</b> by the radio. Track numbers and times are not synchronized between the iPod and radio. Because there is less data transfer between the iPod and radio, this mode has the fastest response time. <b>Content is selected on the iPod.</b>
This type of emulation provides <b>full text display</b> on the radio. If Satellite (XM/Sirius) is equipped it must be disconnected to operate integration in this emulation mode. <b>XM/Sirius receiver is usually located in the trunk or under the passenger seat.</b> <b>Note:</b> Please call to confirm vehicle support prior to installation.			

## Connection Diagram



## for i-VW-SAT2 (retains satellite radio) kit:

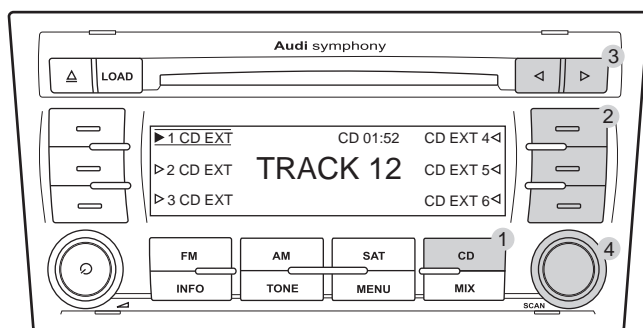


## Installation Tips & Check List

- ☐ For the wiring harness(es) that plug into the back of the radio, the extra ground wire must be attached to the chassis. The extended screw on the back of the radio is a sufficient ground point.
- ☐ To remove Audi radios and/or glovebox CD changers, you must have proper radio removal keys.
- ☐ To enhance the user experience, it is recommended to set the iPod configuration switches to iPod mode on non-text capable radios as this configuration will keep the direct iPod controls unlocked.

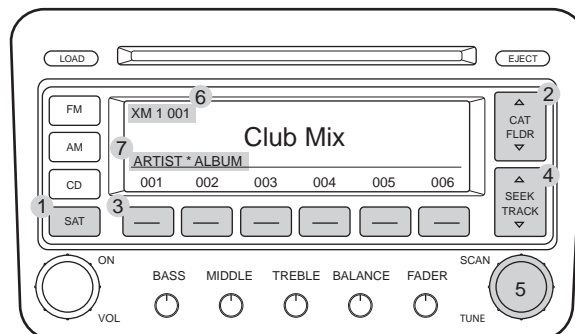
## Operation Overview

### CDC emulation



- 1 Source selector
- 2 Press to change mode.
- 3 Press to change Track, hold to Rewind or Forward.
- 4 Turn to change track.

### SAT emulation



- 1 Source selector
- 2 Press to cycle through Modes 1-6.
- 3 On selected radios you may use these buttons to select Modes 1-6
- 4 Press to change track.
- 5 Turn to change track.
- 6 Source indicator
- 7 This text field may not be shown on all radios.

## Audi Specific Technical Notes

Problem	Solution
<b>Cannot select the interface.</b>	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface (CDC or SAT).
<b>Radio/ steering wheel controls do not operate iPod.</b>	Reset iPod and make sure most recent iPod firmware is installed. Check vehicle's user manual on how steering wheel controls work.
<b>Radio/ steering wheel controls do not operate iPod, but audio is still present.</b>	Select DISC/Mode 5 and Track/Channel 1. Switch back to DISC/Mode 1 and try changing Tracks. DISC 5 (Mode 5) Track 02 (Channel 02) is AUX mode and not correct for the iPod.
<b>Interface has erratic recognition or none at all.</b>	Make sure that the ground wire harness is attached to the back of the radio.
<b>No text display.</b>	Set iPod switches to OFF for "Locked" mode. Text display is only supported on SAT-capable radios with the i-Audi-SAT kit.
<b>No audio from iPod source.</b>	Reset the iPod. Verify proper connection to interface.
<b>iPod does not charge.</b>	Check all connections. Reset iPod and make sure iPod charges while connected to computer or wall charger.
<b>Music is distorted or sound level is too low.</b>	Check and make sure all EQ and BASS boost options are turned off on your iPod.

# BMW/MINI COOPER



Integration for iPod








# BMW/MINI COOPER

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits		Universal Kit
			
BMW	iPod CDC Kit	CDC Note	iPod FM Kit
3-series/M3			
2007 - 2009	please call		FMRDS
2006 (coupe & convertible)	i-BMW-T	1	FMRDS
1998 - 2005	i-BMW-T	1	FMRDS
5-Series/M5			
2004 - 2009	please call		FMRDS
1997 - 2003	i-BMW-T	1, 2	FMRDS
7-Series			
2002 - 2009	please call		FMRDS
1998 - 2001	i-BMW-T	1, 2	N/A
X3			
2004 - 2009	i-BMW-T	1, 2	FMRDS
X5			
2007 - 2009	please call		FMRDS
2000 - 2006	i-BMW-T	1, 2	FMRDS
Z3/M-Coupe/M-Roadster			
1996 - 2002	i-BMW-T	1	FMRDS
Z4/M-Coupe/M-Roadster			
2003 - 2008	i-BMW-T	1, 2	FMRDS
Z8			
2000 - 2003	i-BMW-T	1, 2	FMRDS
Mini Cooper			
Cooper/Cooper S			
2007 - 2008	please call		FMRDS
2002 - 2006	i-BMW-T	3	FMRDS
BMW motorcycle			
K1200LT			
2000-2008	i-BMW-T	4	N/A

Note for ALL:

- Vehicles listed above must be pre-wired for factory CD changer (most USA and Canadian models are pre-wired)
  - Text is supported on all text-capable radios.
  - BMW 3-series never had DSP amplifier.
1. If equipped with factory SAT module then BMW SAT cable option is required (see chart below).
  2. If equipped with digital DSP amplifier then BMW DSP adapter option is required (see chart below).
  3. CD text is only available on selected September 2005 and newer Cooper S.
  4. Text display is limited on 05-06 models.

## Optional Interfaces

Part number	Description
i-BMW-SAT	BMW SAT Cable
i-BMW-DSP	BMW DSP Adapter



## FAQs Before Purchasing the Kit

### Do BMW/Mini radios support text display?

Yes, CD Text capable BMW radios support text display with the DICE kit. This normally includes 1998-2007 supported BMW models and the 2006 Mini Cooper.

### Does my factory CD-Changer have to be disconnected?

Yes, the factory BMW CD-Changer connections are utilized to integrate the DICE system.

### My car is not pre-wired. What can I do?

We have radio-end kits available for selected model.

### If the vehicle is equipped with factory satellite radio, can it be retained?

Yes, the factory satellite radio can be retained with an additional satellite harness.

### My vehicle is equipped with a digital DSP amplifier, is this supported?

Yes, digital DSP amplifiers are supported; however the additional DSP kit (i-BMW-DSP) is required. DSP can be verified by checking the factory CD Changer connections: if 3-pin and mini coax connectors are present, the DSP kit is required. However, if a 3-pin and 6-pin connectors are available, then DSP most likely will not be needed.

## Contents Identifier



user manual



docking cable



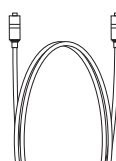
vehicle specific interface module



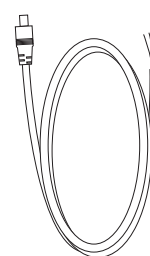
vehicle specific connector



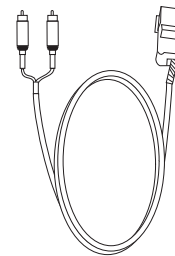
DSP interface module



coax cable



power adapter

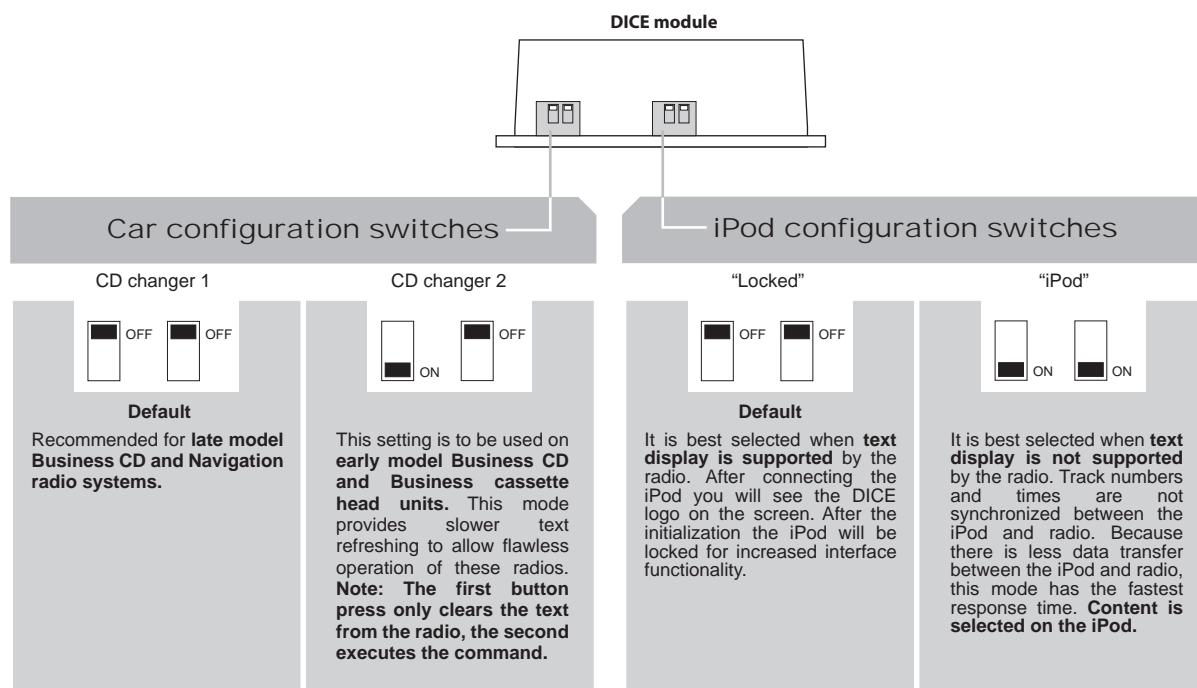


RCA 6-pin harness

for DSP kit:

## About Dip Switch Settings

The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



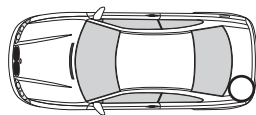
## Connection Diagram

for i-BMW-T kit:

**Note:** CD Changer of **BMW Z8** is located right behind the driver's seat.

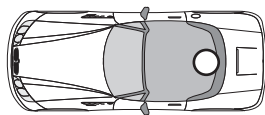
CD Changer locations:

BMW 3, 5, 7 series,  
M3, M5 & X5



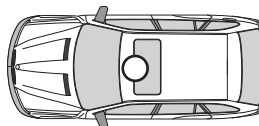
(left hand side of the trunk)

BMW Z4  
2006-2008 M-Coupe & M-Roadster



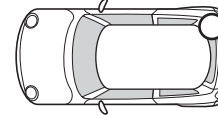
(between seats, underneath  
subwoofer)

BMW X3



(underneath carpeting under  
the center console)

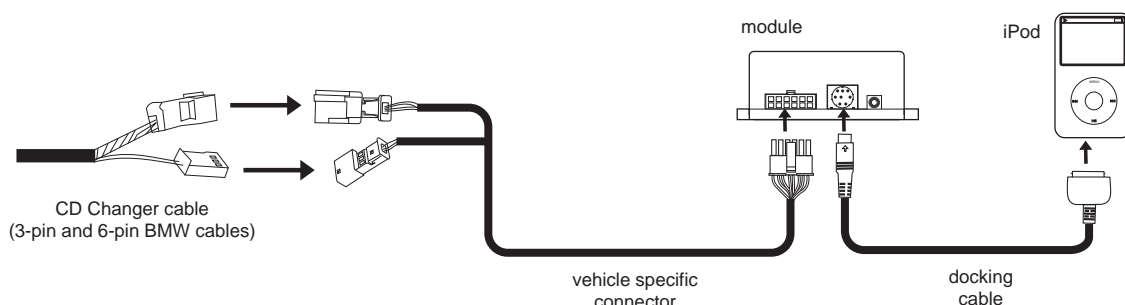
BMW 1999-2002 M-Coupe & M-Roadster  
Z3, and Mini Cooper



(right hand side of the trunk)

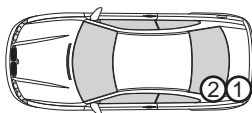


During installation, make sure that the 3 pin connector from the vehicle does not have a brown wire in the middle. The 3 pin connector of the phone pre-wiring looks identical to the 3 pin connector of the CD changer pre-wiring! Do not use the 3pin connector that has a brown wire in the middle, but locate the one that has the brown wire on the side! Incorrect connection will result in permanent damage to the unit and will not be covered by warranty!



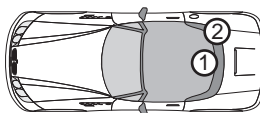
for DSP kit:

BMW 5, 7 series, M5 & X5



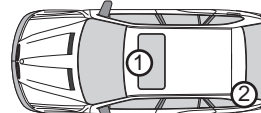
① 3-pin connector

BMW Z4

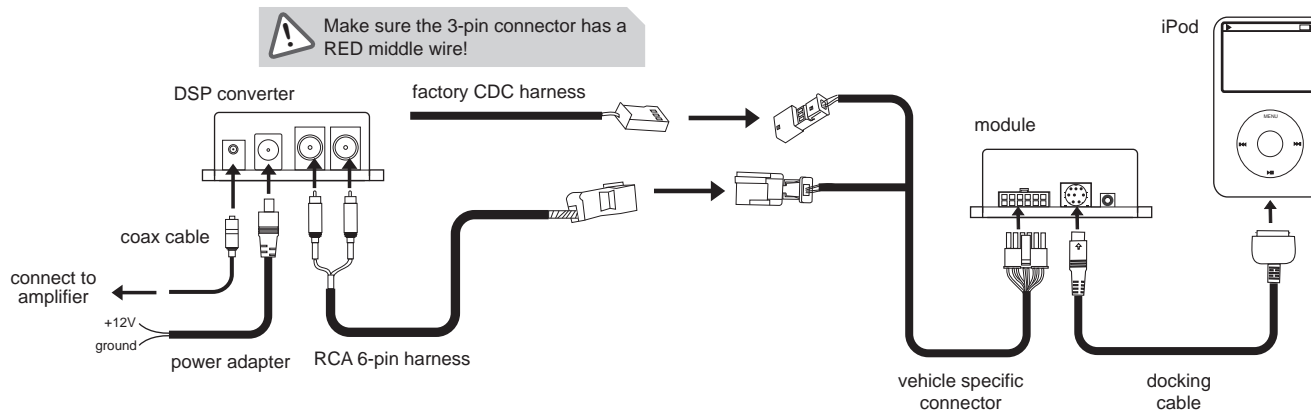


② DSP amplifier

BMW X3



Make sure the 3-pin connector has a  
RED middle wire!

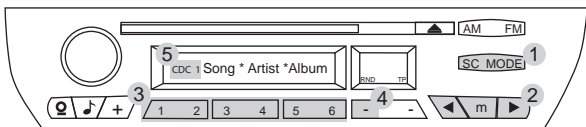


## Installation Tips / Check List

- ☐ When routing the vehicle specific harness to the front of the vehicle, some BMW models have a panel below the glovebox where the DICE module can be stored for easy access.
- ☐ When installing a DSP kit, you can temporarily attach it to the battery for constant power for testing purposes, but it should NOT be installed this way.
- ☐ CD changer connections are normally coiled up and hidden well when a CD changer is not present. Please make sure to use the CDC connections and not the wiring harness of the phone system—as they both look the same! Check Connection Diagram above for detailed information.

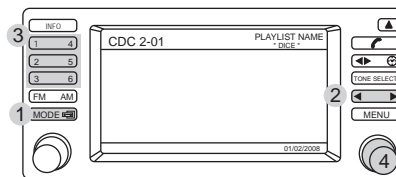
## Operation Overview

BMW business CD radio



- 1 Press the MODE button to access the interface.
- 2 Press and hold the Track buttons to RW or FFW. On some older BMW radios the button must be engaged to perform the same function.
- 3 Use buttons 1 - 6 to change between modes.
- 4 Use Random to enable Shuffle Songs.
- 5 Source indicator

BMW radio with Navigation



- 1 Press the MODE button to access the interface.
- 2 Press this button to change track, press and hold it to RW or FFW
- 3 Use button 1 - 6 to change between modes.
- 4 Turn the jog dial to change track. Note that a 9 second timeout is engaged once any of the alternate display buttons are pressed. If exiting from any of these sub-screens without waiting for the normal timeout, you MUST wait for 9 seconds before being able to use the jog dial again to navigate content.

### Text display settings

Make sure to select the appropriate text display setting during the initial setup of the DICE kit. You must configure the text option by pressing DISC 6 then selecting a Track number that corresponds to the designated display:

Track #	Text Displayed On	Application	Characters
99	No Text	All	----
01	Radio	3-Series/Z3/Z4/X3/'04-K1200	12
02	Navigation	All with nav.	15
03	Cluster/OBD	5-Series/7-Series/X5 w/o nav.	20
04	MID	Alternate for 5-Series/7-Series/X5	11
05	Alternate Location	All with nav.	8
06	Alt Locat.(large font)	All with nav.	8
07	Resume Text	Use if text does not resume after phone call	----
08	Motorcycle	05+ K1200	12
09	No Text	All	----

## BMW/Mini Specific Technical Notes

Problem	Solution
<b>Why do the radio buttons need to be double-clicked on my early model 3-Series?</b>	On earlier models of 3-Series and Z3 (1999-2002) vehicles, double-clicking is required when text is being displayed because the first button press clears the text and the second button press performs the command.
<b>Radio/Nav display only shows DISC and Track number, but there is no iPod control.</b>	Select DISC 5 and make sure it is set to Track 01. Here you are making sure that iPod mode is selected, and not AUX mode (Track 02)
<b>Cannot select CD changer source.</b>	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface (CDC or DSP).
<b>Radio/ steering wheel controls do not operate iPod.</b>	Reset iPod and make sure most recent iPod firmware is installed.
<b>No text display.</b>	Make sure DIP switch settings are correctly set for text display. Note that early model Mini Cooper vehicles do not support text. You must also configure the text as described above
<b>No audio from iPod source.</b>	Reset the iPod.
<b>iPod does not charge.</b>	Check all connections. See if iPod charges while connected to computer or wall charger. You may need to reset the iPod.
<b>Music is distorted or sound level is too low.</b>	Check and make sure all EQ and BASS boost options are turned off on your iPod.

# HONDA



Integration for iPod





# HONDA

vehicle specific integration for iPod



# COMPATIBILITYchart

Vehicle	Vehicle Specific Integration Kits				Universal Kit
Honda	iPod CDC Kit	CDC Note	iPod SAT Kit	SAT Note	iPod FM Kit
Accord					
2003 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
1998 - 2002	i-Honda-R2	3	N/A		FMRDS
Civic					
2006 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
1998 - 2005	i-Honda-R2	3	N/A		FMRDS
CRV					
2005 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
1999 - 2004	i-Honda-R2	3, 4	N/A		FMRDS
Element					
2003 - 2009 (EX/SC)	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
2003 - 2009 (DX/LX)	i-Honda-R2	3, 4	N/A		FMRDS
Insight					
2000 - 2003	i-Honda-R2	3	N/A		FMRDS
Odyssey					
2005 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
1998 - 2004	i-Honda-R2	3, 4	N/A		FMRDS
Pilot					
2006 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
2003 - 2005	i-Honda-R2	3, 4	N/A		FMRDS
Prelude					
1998 - 2002	i-Honda-R2	3	N/A		FMRDS
Ridgeline					
2006 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
S2000					
2004 - 2009	i-Honda-R3/R4	1	i-Honda-R3/R4	2	FMRDS
2000 - 2003	i-Honda-R2	3	N/A		FMRDS

Note for ALL:

• Text display not available in CDC emulation.

1. Navigation-equipped vehicles or factory satellite retention requires i-Honda-R4 kit.
2. Text available only in SAT emulation mode - Radio must have XM button and factory XM must be disconnected.
3. Not compatible with in-dash 6 CD system; external CD-changer must be disconnected.
4. Not compatible with Navigation system or Rear-Seat DVD Entertainment system.



Honda

## FAQs Before Purchasing the Kit

### How can I tell if my factory Honda radio will support text?

The factory radio must have an XM or SAT button.

### Can factory XM be retained?

Yes, factory XM can be retained with our Y-harness that is included in the i-Honda-R4 kit. Retaining XM requires the kit to be in CDC emulation mode.

### Are any of the operational features different between SAT-mode and CD-mode of the DICE unit?

Operating the iPod through the factory radio is nearly identical in both emulation modes. SAT-mode has the benefit of text display.

### Can the steering wheel controls operate my iPod?

Yes, the steering wheel controls can operate the iPod.

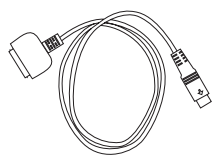
## Content Identifier



user manual

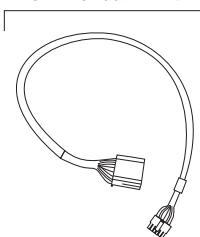


vehicle specific interface module



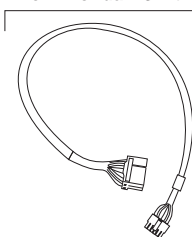
docking cable

for i-Honda-R2 kit:



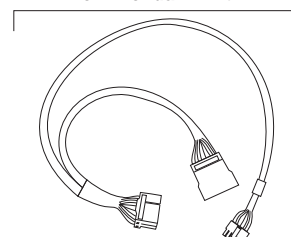
Honda R2  
Bus Connector

for i-Honda-R3 kit:



Honda R3  
Bus Connector  
(regular harness that is used for non-nav Honda and disables XM (if equipped))

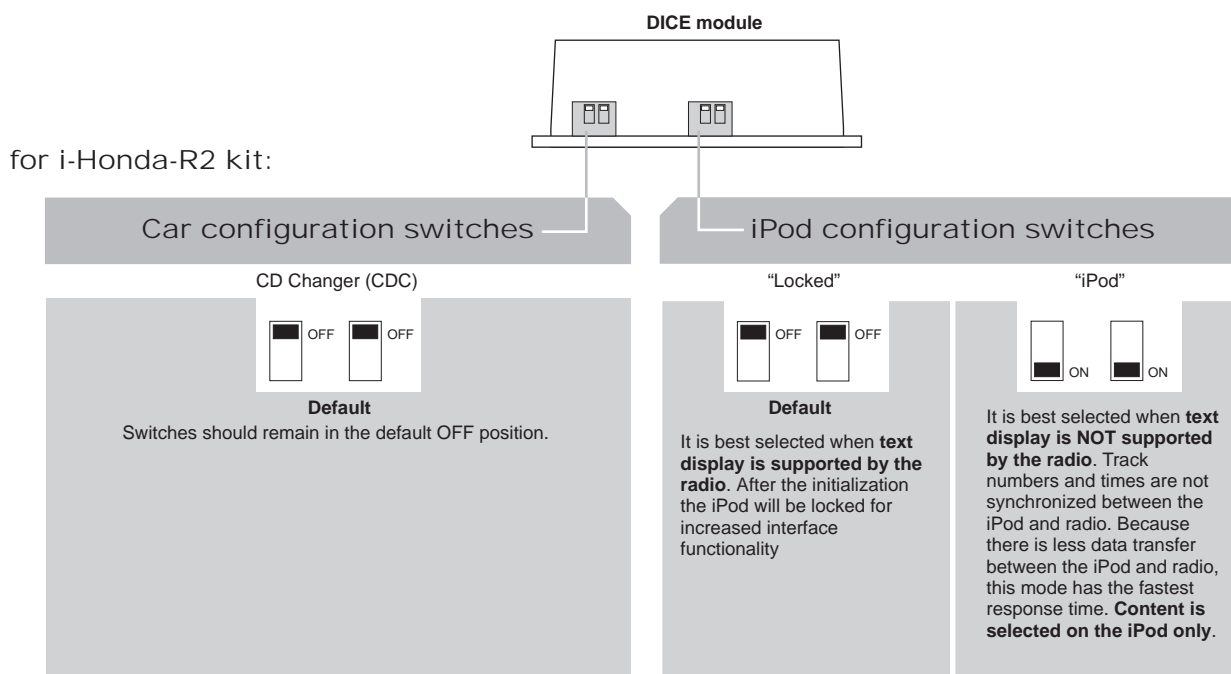
for i-Honda-R4 kit:



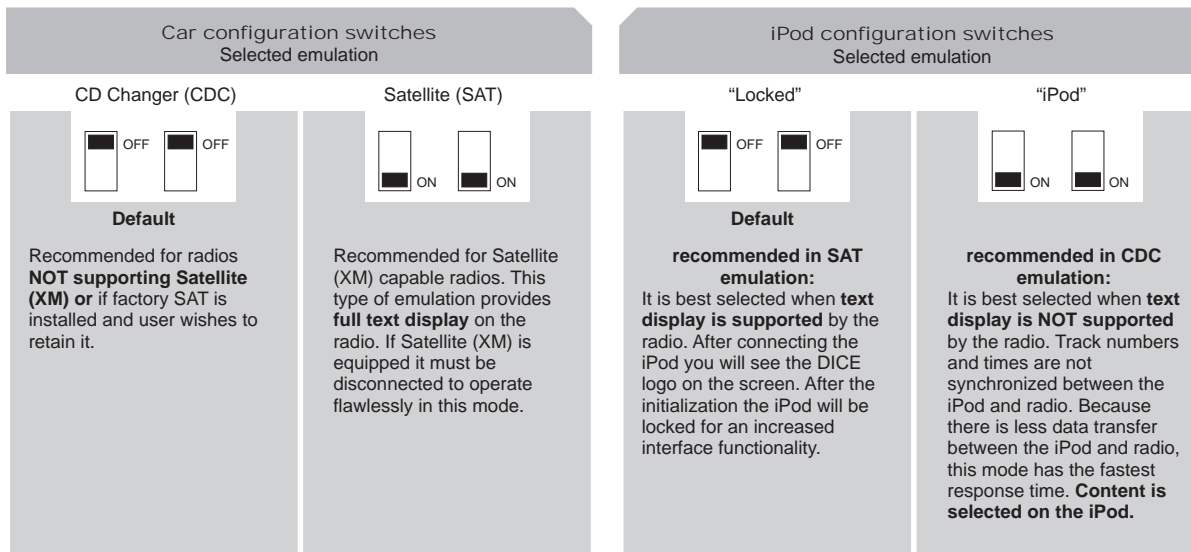
Honda R4  
Bus Connector  
(Y-harness required for navigation-equipped Honda and/or to retain factory XM)

## About Dip Switch Settings

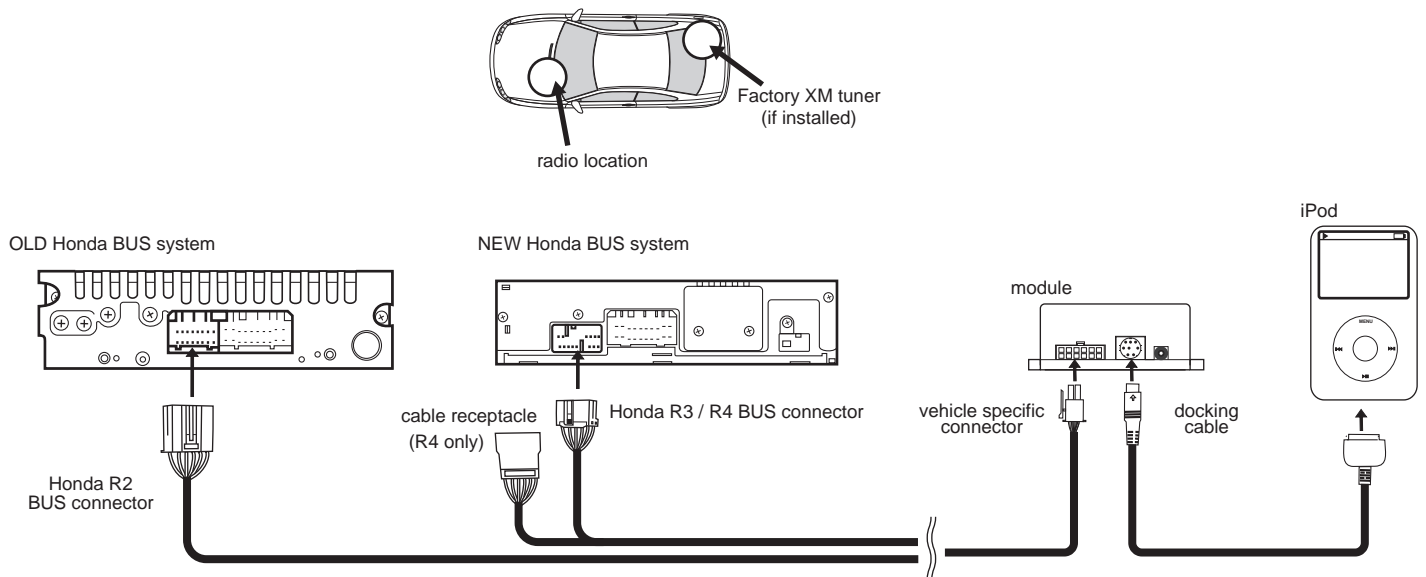
The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



## for i-Honda-R3/R4 kit:



## Connection Diagram



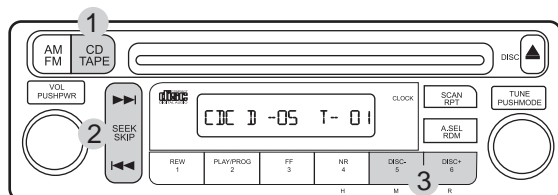
- Note that in some vehicles the physical location of the CD changer / SAT connector is on the bottom of the radio

## Installation Tips / Check List

- ☐ To operate in SAT mode, the XM tuner must be physically disconnected. On Honda vehicles, this is usually located in the trunk area on the left or right side near the wheel-well. The newer (2007+) CR-V has it behind the glovebox up front. The Honda Ridgeline and Accord Hybrid (2005-07) have it behind the rear passenger seat.
- ☐ On 2004 Accord, if removing the storage bin in the lower part of the dash, have the door closed and it will be much easier to remove.

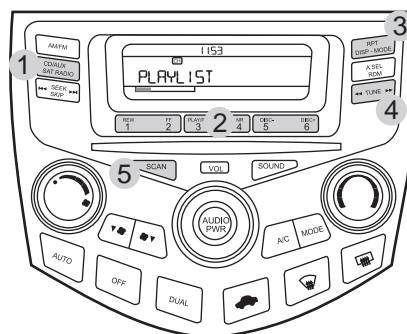
## Operation Overview

### CDC emulation



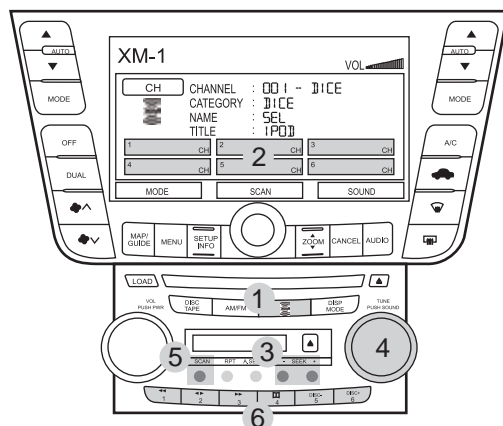
- 1 Source selector
- 2 Press to change track, press and hold to RW or FFW.
- 3 Press to change modes.

### SAT emulation



- 1 Source selector
- 2 Use Presets to change modes.
- 3 Toggle between available text fields.
- 4 Press to change track.
- 5 Press to enable Shuffle Song.

### SAT emulation with navigation system



- 1 Source selector
- 2 & 6 Use Presets to change modes.
- 3 Press to change track.
- 4 Turn to change track.
- 5 Press to enable Shuffle Song.

## Honda Specific Technical Notes

Problem	Solution
Sound of factory installed satellite radio is bleeding through when the iPod audio source is selected.	The factory XM module must be disconnected. It is usually located in the trunk of the vehicle.
iPod does not display the DICE logo when connected.	Reset iPod and make sure most recent iPod firmware is installed. Make sure all cables are connected properly. Note that iTouch does not display the logo.
Cannot select CD changer or SAT source.	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface.
Radio/ steering wheel controls do not operate iPod.	Reset iPod and make sure most recent iPod firmware is installed.
No text display.	Make sure DIP switch settings are correctly set for text display.
No audio from iPod source.	Reset the iPod.
iPod does not charge.	Check all connections. See if iPod charges while connected to computer or wall charger. You may need to reset the iPod.
Music is distorted or sound level is too low.	Check and make sure all EQ and BASS boost options are turned off on your iPod.
Cannot find SAT mode.	If the radio does not have a SAT or XM button, then it will not support SAT emulation of the DICE module. Have the DICE module configured for CDC emulation.
Cannot fit i-Honda-R2 kit into any of the ports on the radio or cannot fit i-Honda-R3/R4 into any of the ports on the radio.	Various vehicle trim models (EX, LX, DX, etc.) can have different radios for a specific year. If the i-Honda-R2 connection doesn't fit into any ports, the i-Honda-R3/R4 will be required and vice versa.

# LEXUS



Integration for iPod











# LEXUS

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits			Universal Kit	
					
Lexus	iPod (CDC, MD, SAT, MP3) Kit	Note	iPod FM Kit		
IS250/300/350					
2005 - 2009	i-Toyota-R	1, 2	FMRDS		
ES300/330/350					
2005 - 2009	i-Toyota-R	1, 2	FMRDS		
GS300/350/430/450h					
2006 - 2009	i-Toyota-R	1, 2	FMRDS		
RX300/330/350/400h					
2004 - 2009	i-Toyota-R	1, 2	FMRDS		
LS430/460/600h					
2003 - 2009	i-Toyota-R	1, 2	FMRDS		
LX470/570					
2003 - 2009	i-Toyota-R	1, 2	FMRDS		

Note:

1. Text display supported on 2003+ vehicles equipped with a CD-text, MP3-text, MD-text, or SAT capable factory radio (if your radio only supports RDS text (i.e. 2004 cars) with a MSG button, then consider the FMRDS kit if text is more important feature than radio control).
2. External CD-changer must be disconnected. Factory SAT can be retained.



## FAQs Before Purchasing the Kit

### Do I lose functionality of any devices in my vehicle that were factory installed?

External CD-changers are disabled (mainly on some 2002-2004 models), other factory options can be retained.

### What are the different emulation modes for?

The i-Toyota-R kit offers four different modes of operation (CD-changer, Mini-DISC, Satellite, and MP3). Depending on the radio in your vehicle, one or the other will offer TEXT display support.

### Can this kit be used on vehicle sold outside the US?

MD changer emulation is ideal for customers in the U.K. and Japan.

### If my vehicle's factory radio does not have a TEXT button present, does this mean my radio won't support text display?

No, it does not. Many late-model touch-screen navigation systems in Toyota/Lexus (2005-2008) will have a TEXT button appear on screen to cycle between text-fields.

### Will the i-Toyota-R support video playback on my navigation screen?

No, our iPod kit only transfers the audio and text information for the audio through your stereo system.

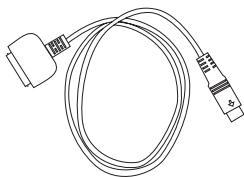
## Content Identifier



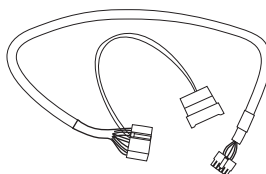
user manual



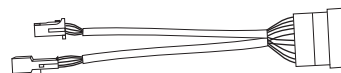
vehicle specific interface module



iPod docking cable



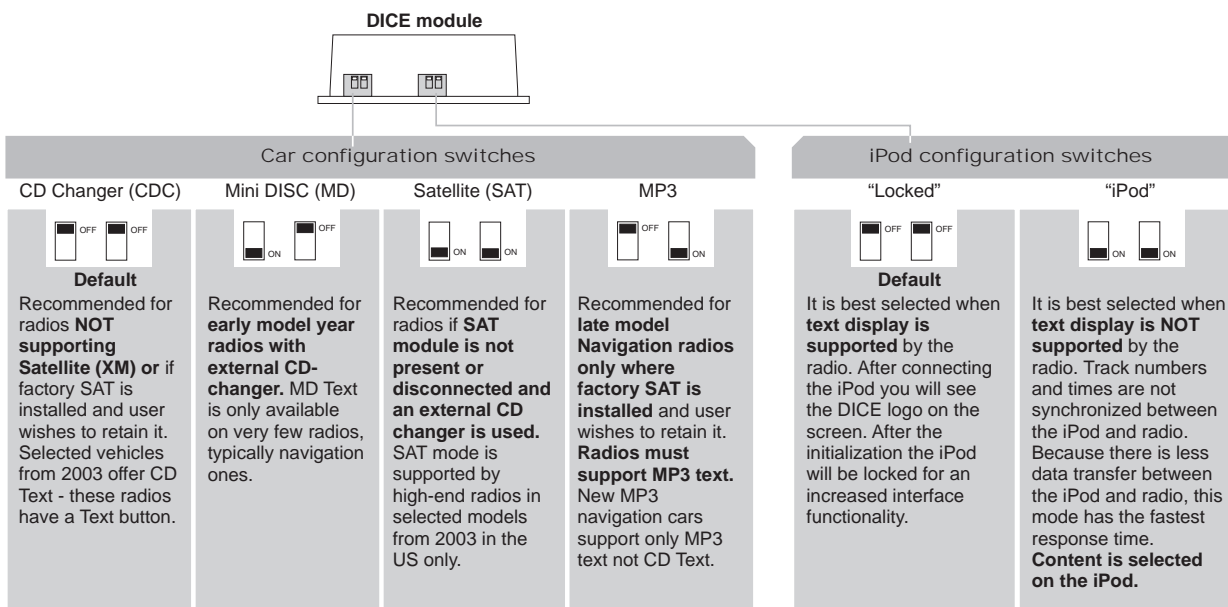
Toyota01 BUS connector



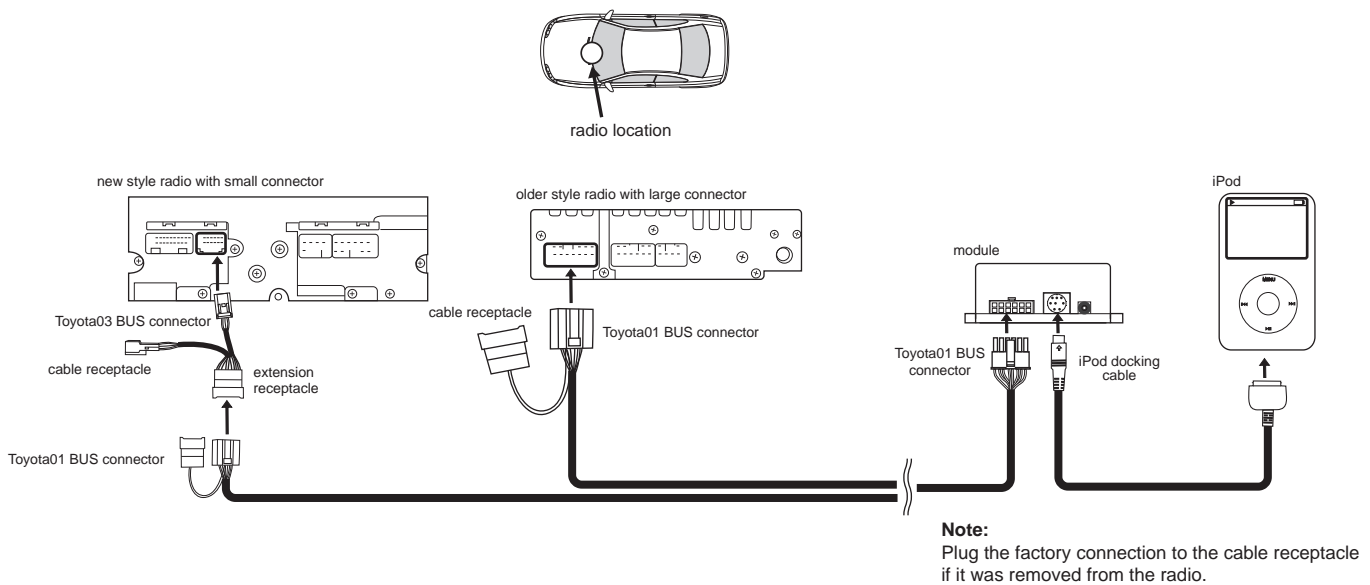
Toyota03 BUS connector

## About Dip Switch Settings

The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



## Connection Diagram



## Installation Tips / Check List

### Identify your audio system

Select the mode that best suits your vehicle. The following chart identifies the recommended mode for the listed radios. Note that your vehicle may support more than one mode.

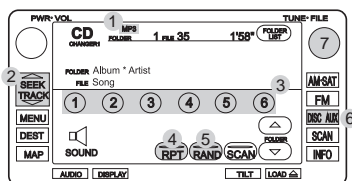
Radios	External CDC	Factory SAT	CDC	MD*	SAT**	MP3
98-02 Tape/in-dash CD	not installed or disconnected	not available	✓	✓		
98-02 Tape/in-dash CD	present	not available		✓		
03-06 Tape/CD	not installed or disconnected	not installed	✓	✓	✓	
03-06 Tape/CD	not installed or disconnected	present	✓	✓		
03-06 Tape/CD	present	not installed		✓	✓	
03-06 Tape/CD	present	present		✓		
06-07 MP3 Navigation	not available	not present			✓	✓
06-07 MP3 Navigation	not available	present				✓

\* Not all radios support MD mode. If an external MD changer is present, it must be disconnected.

- ☐ Set the DICE unit to SAT mode for a slightly more intuitive interface.
- ☐ For 2004-2009 Lexus RX models, after removing the panel in front of the shifter there are four bolts (10mm) to be removed for the radio to slide out. Two are easily visible, but the other two are deeper inside at an upward angle.
- ☐ Toyota/Lexus radios are generally held in with 10mm bolts.

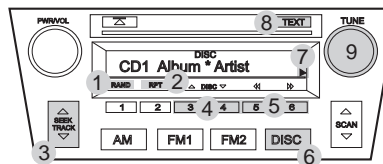
## Operation Overview

### MP3 emulation



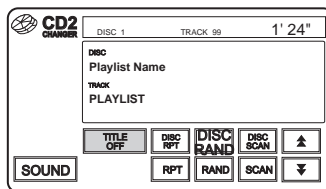
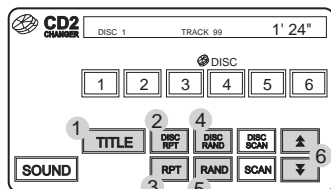
- 1 Source indicator
- 2 Press to change Track.
- 3 Press to select PRESET numbers 1 - 6.
- 4 Press RPT short to repeat one, long to repeat all.
- 5 Press RAND short to Shuffle Songs, long to Shuffle Albums.
- 6 Source selector
- 7 Turn to change Track.

### CDC/MD emulation (without Navigation)



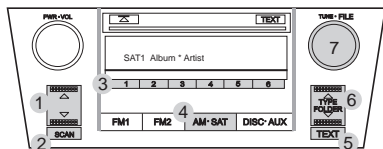
- 1 Press RAND short to Shuffle Songs, long to Shuffle Albums.
- 2 Press RPT short to repeat one, long to repeat all.
- 3 Press to change Track.
- 4 Press to change modes.
- 5 Press to RW or FFW.
- 6 Source selector
- 7 Arrow shows if additional information is available. Hold TEXT button for more information.
- 8 Press the TEXT button to cycle between display fields.
- 9 Turn to change Track.

### CDC/MD emulation (with Navigation)



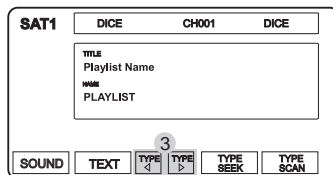
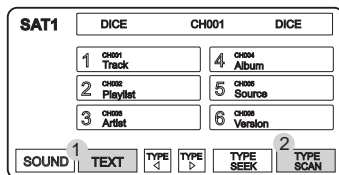
- 1 Press TITLE to toggle between screens.
- 2 Press DISC RPT to Repeat All.
- 3 Press RPT to Repeat One.
- 4 Press DISC RAND to shuffle Albums.
- 5 Press RAND to Shuffle Songs.
- 6 Press to change Track.

### SAT emulation (without Navigation)



- 1 Press to change Track.
- 2 Use Scan to enable Shuffle Songs.
- 3 Use Presets to change modes.
- 4 Source selector
- 5 Press the TEXT button to toggle between available TEXT fields.
- 6 Use the TYPE button to engage/disengage RW or FFW
- 7 Turn to change Track.

### SAT emulation (with Navigation)



- 1 Press to TEXT button to toggle between available
- 2 Use TYPE SCAN to enable Shuffle Songs.
- 3 Use the TYPE button to engage/disengage RW or FFW

## Lexus Specific Technical Notes

Problem	Solution
Text is not displaying in selected emulation.	Identify your audio system (refer to Installation tip session) first and set switches accordingly. Note that your vehicle may support more than one mode.
Radio/Nav display only shows DISC/Presets and Track/Channel numbers, but there is no iPod control	Select DISC/Presets 5 and make sure it is set to Track/Channel1.
Cannot select the interface.	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface.
Radio/ steering wheel controls do not operate iPod.	Reset iPod and make sure the most recent iPod firmware is installed. Check vehicle user manual on how steering wheel controls work.
The interface operates very intermittently and erratically in SAT mode.	If the unit is being operated in SAT mode, make sure the factory satellite tuner is disconnected in the vehicle. Otherwise, the unit will have to be set up in a different emulation mode (CD, MP3, MD).
No audio from iPod source.	Reset the iPod. Verify proper connection to iPod/interface.
iPod does not charge.	Check all connections. See if iPod charges while connected to computer or wall charger. You may need to reset the iPod.
Music is distorted or sound level is too low.	Make sure all EQ and BASS boost options are turned off on your iPod.

# MAZDA



Integration for iPod





# MAZDA

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits				Universal Kit
<b>Mazda</b>	<b>iPod CDC Kit</b>	<b>CDC Note</b>	<b>iPod SAT Kit</b>	<b>SAT Note</b>	<b>iPod FM Kit</b>
3					
2004 - 2007	i-Mazda-R	1	i-Mazda-R2	1, 2	FMRDS
5					
2005 - 2007	i-Mazda-R	1	i-Mazda-R2	1, 2	FMRDS
6					
2003 - 2008	i-Mazda-R	1, 3	i-Mazda-R2	1, 2	FMRDS
Miata/MX-5					
2005 - 2008	i-Mazda-R	1	i-Mazda-R2	1, 2	FMRDS
MPV					
2005 - 2006	i-Mazda-R	1	i-Mazda-R2	1, 2	FMRDS
RX8					
2004 - 2008	i-Mazda-R	1	i-Mazda-R2	1, 2	FMRDS
Tribute					
2005 - 2008	i-Mazda-R	1	i-Mazda-R2	1, 2	FMRDS

## Notes:

- Text display not available in CDC emulation.
  - Mazda RX8 radio requires firmware version 9.55 or higher.
1. Factory satellite radio and/or external CD-changer must be disconnected if equipped.
  2. Text display supported but radio MUST have SAT button present for i-Mazda-R2 compatibility.
  3. 2004 model may not accept external CDC input and requires radio modification.



Mazda

## FAQs Before Purchasing the Kit

### How can I check the firmware of my radio in my Mazda RX-8?

When on FM source, hold TEXT and Preset 1 at the same time and the firmware version should appear on the radio screen.

### I have factory satellite radio, can I retain this option?

No, the factory satellite radio must be disconnected when integrating one of our Mazda iPod kits.

### What kind of modification is required on the 2004 Mazda6?

The modification required is soldering a component onto the radio's circuit board, which can be done by a professional audio shop. This modification is not always required.

### Will the text scroll on my Mazda's radio display with the i-Mazda-R2 kit?

Yes, the default setting of the i-Mazda-R2 kit is to auto-scroll the title and artist of the song.

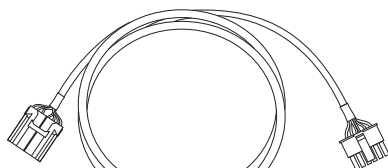
## Content Identifier



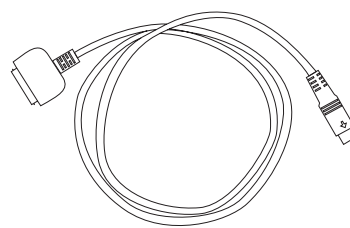
user manual



vehicle specific interface module



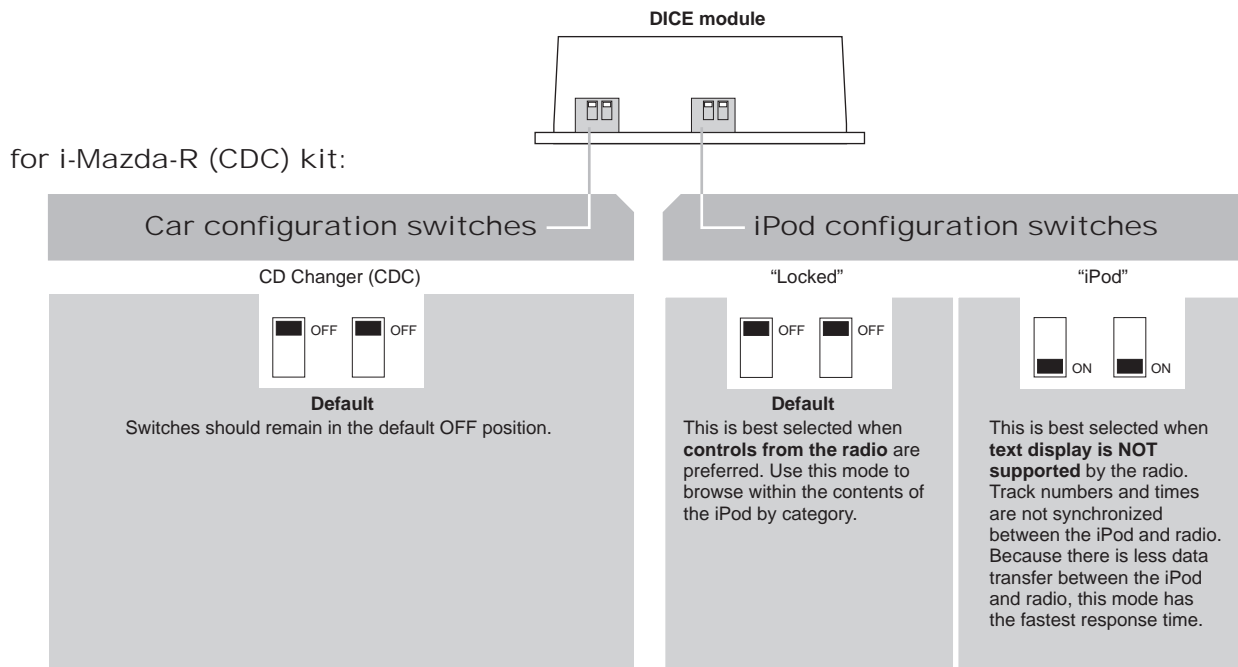
Mazda connector



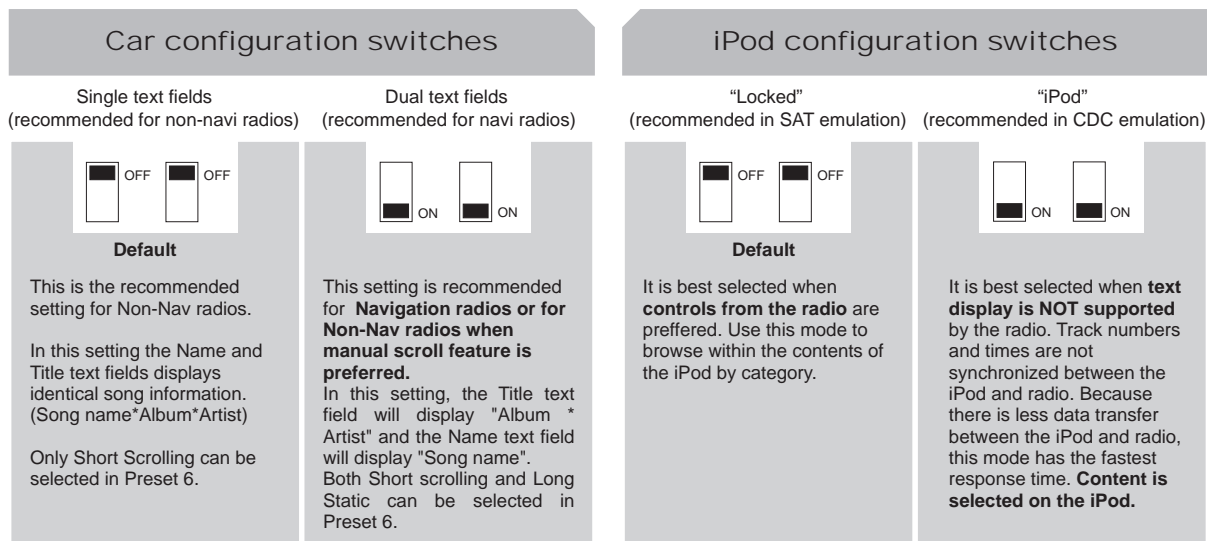
iPod docking cable

## About Dip Switch Settings

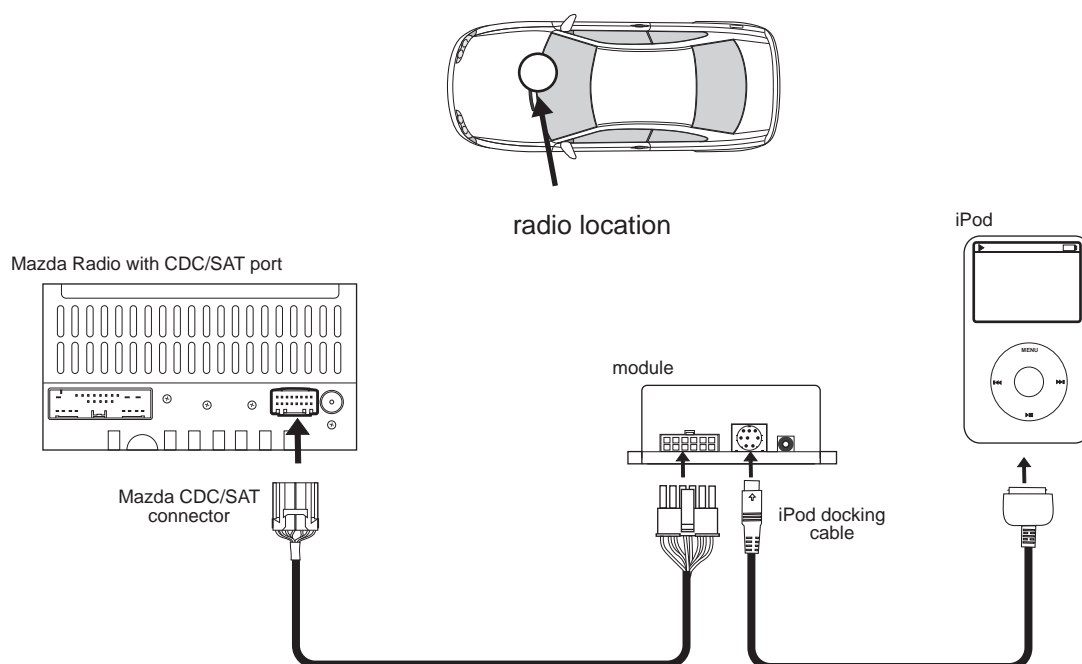
The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



for i-Mazda-R2 (SAT) kit:



## Connection Diagram

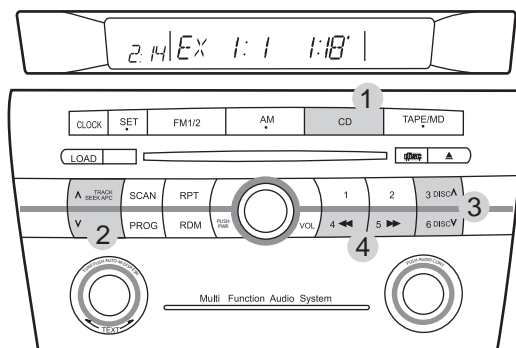


## Installation Tips / Check List

- ☐ On the CX-9, the trim pieces around the radio/dash and console need to be popped off first; then you access the screws holding the radio.
- ☐ The Mazda3's center console pops up with clips. The shift knob can be removed by rotating it counter-clockwise.
- ☐ To enhance the user experience, it is recommended to set the iPod configuration switches to iPod mode on non-text capable radios as this configuration will keep the direct iPod controls unlocked.

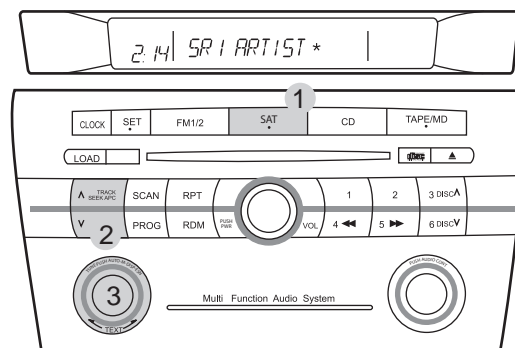
## Operation Overview

CDC emulation



- 1 Source selector
- 2 Press to change Track
- 3 Press to change modes.
- 4 Press to RW or FFW.

SAT emulation



- 1 Source selector
- 2 Next / Previous track. Double-click to change modes.
- 3 Press to toggle between available text fields. TURN to scroll text.

## Mazda Specific Technical Notes

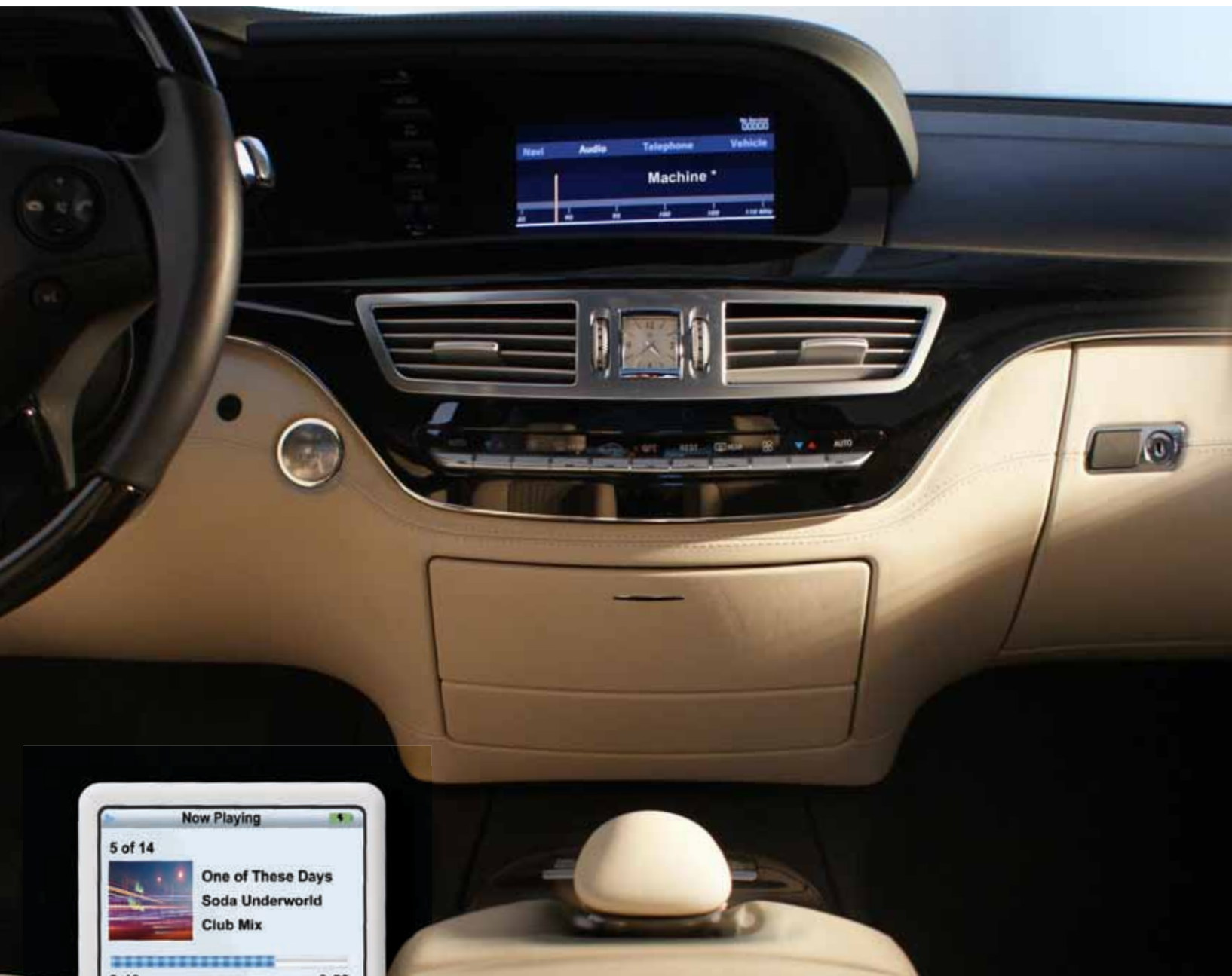
Problem	Solution
Cannot select the interface.	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface. 2004 Mazda6 may require radio modification to accept external CD changer connection.
Radio/ steering wheel controls do not operate iPod.	Reset iPod and make sure most recent iPod firmware is installed. Check vehicle user manual on how steering wheel controls work. Not all Mazda vehicles support track changing from the steering wheel.
No text display.	Make sure DIP switch settings are correctly set for text display.
Text not showing or cannot cycle between text fields.	On some Mazda vehicles (Mazda 6), the DISP button is used for cycling the different text fields. Also check dip switch settings.
iPod does not charge.	Check all connections. Reset iPod and make sure iPod charges while connected to computer or wall charger.
Radio continues to display "UPDATING" for more than one minute.	Turn the power off to the radio and then back on again.
Unexpected operation in SAT mode.	The control interface in SAT mode is very different from the interfaces used on other vehicles, please carefully check the user manual.

# MERCEDES



Integration for iPod





# MERCEDES

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits				Universal Kit
<b>Mercedes</b>	<b>iPod D2B Kit</b>	<b>D2B Note</b>	<b>iPod MOST Kit</b>	<b>MOST Note</b>	<b>iPod FM Kit</b>
C-Class					
2005 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
1999 - 2004	i-Mercedes-D2B	1, 2	N/A		FMRDS
CL-Class					
2004 - 2006	N/A		i-Mercedes-MOST	2, 3	FMRDS
2000 - 2003	N/A		N/A		FMRDS
CLK-Class					
2005 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
1999 - 2004	i-Mercedes-D2B	1, 2	N/A		FMRDS
CLS-Class					
2005 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
E-Class					
2004 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
G-Class					
2007	N/A		i-Mercedes-MOST	2, 3	FMRDS
1999 - 2005	i-Mercedes-D2B	1, 2	N/A		FMRDS
GL-Class					
2007	N/A		i-Mercedes-MOST	2, 3	FMRDS
Maybach					
2004 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
ML-Class					
2006 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
2001 - 2005	i-Mercedes-D2B	1, 2	N/A		FMRDS
R-Class					
2006 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
S-Class					
2004 - 2006	N/A		i-Mercedes-MOST	2, 3	FMRDS
2001 - 2003	i-Mercedes-D2B	1, 2	N/A		FMRDS
SL-Class					
2006 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
2005	N/A		N/A		FMRDS
2001 - 2004	i-Mercedes-D2B	1, 2	N/A		FMRDS
SLK-Class					
2005 - 2008	N/A		i-Mercedes-MOST	2, 3	FMRDS
1999 - 2004	i-Mercedes-D2B	1, 2	N/A		FMRDS

Notes:

1. Only compatible with Audio 10, Audio 30, COMAND 2.0, or COMAND 2.5 radio. Audio is non-nav, COMAND is navigation.
2. CD-Changer must be disconnected. In-dash 6-CD changer radios not compatible.
3. Only compatible with navigation radio-system.



## FAQs Before Purchasing the Kit

### Will my factory 6-CD changer be disabled with this unit installed?

Yes, the factory CD changer must be disabled to have the iPod kit integrated into the factory radio system.

### Can I install this unit myself?

It is recommended that this integration kit be installed by a professional that has experience installing fiber-optic systems. It can be installed directly behind the navigation unit, or at the CD-changer location.

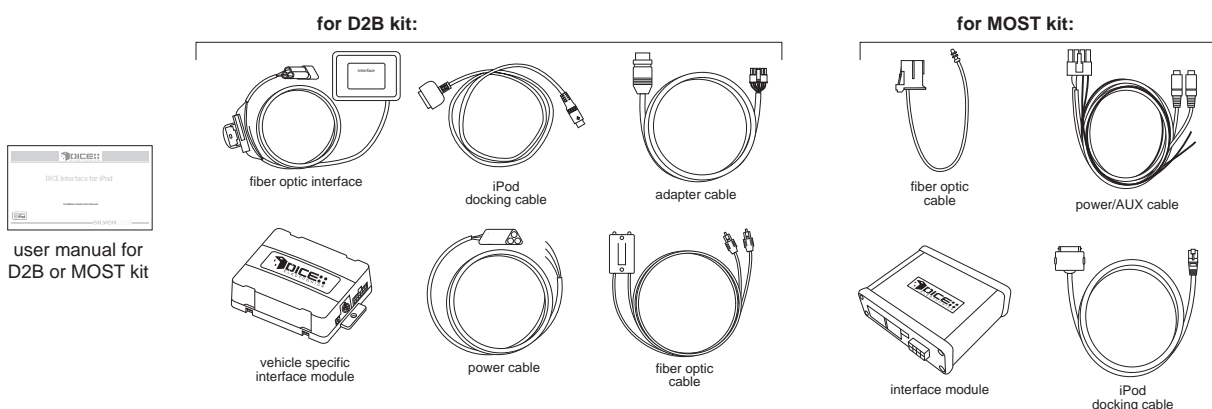
### What will my navigation screen display while operating my iPod?

The display will allow you to see and browse Playlists, Artists, Albums, Genre, and songs within these categories for i-Mercedes-MOST kit.

### Can I set the unit to a mode where I can use my iPod directly?

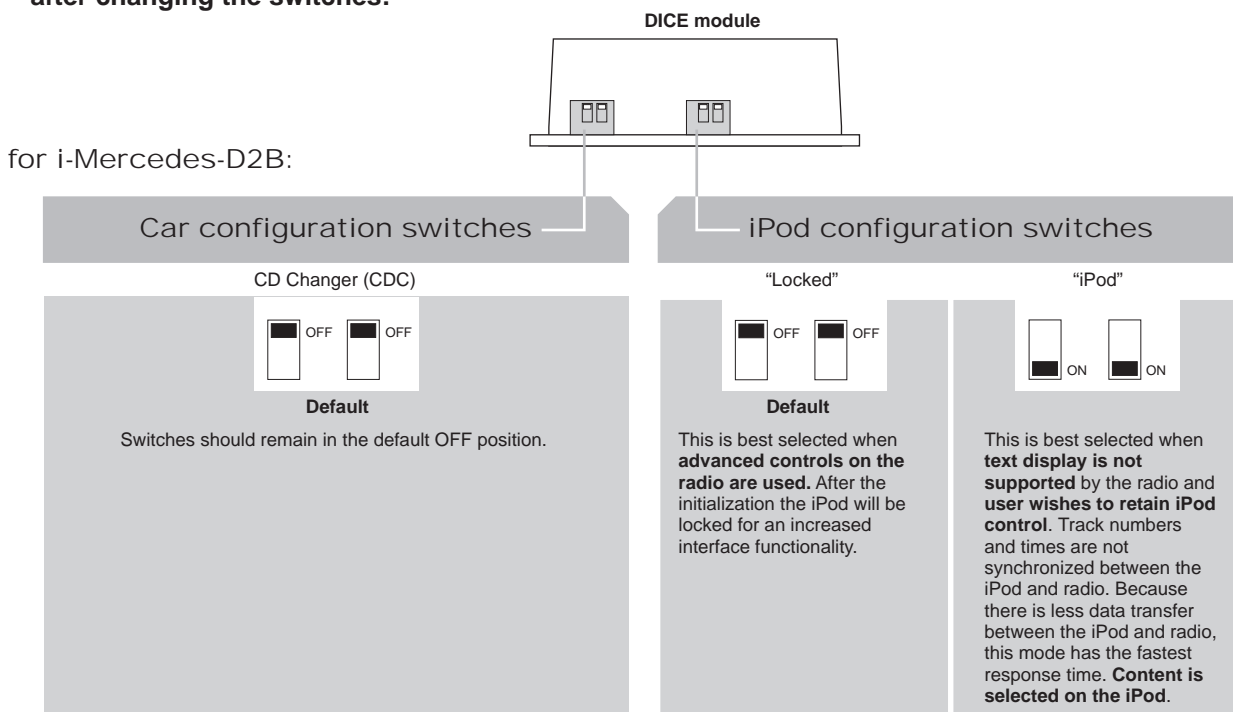
Yes, through the radio you can set up the unit for iPod control, and the iPod becomes unlocked, but this disables text and browsing controls through the radio.

## Content Identifier



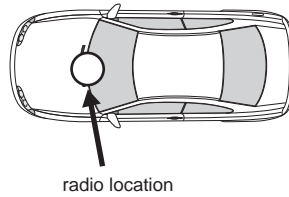
## About Dip Switch Settings

The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**

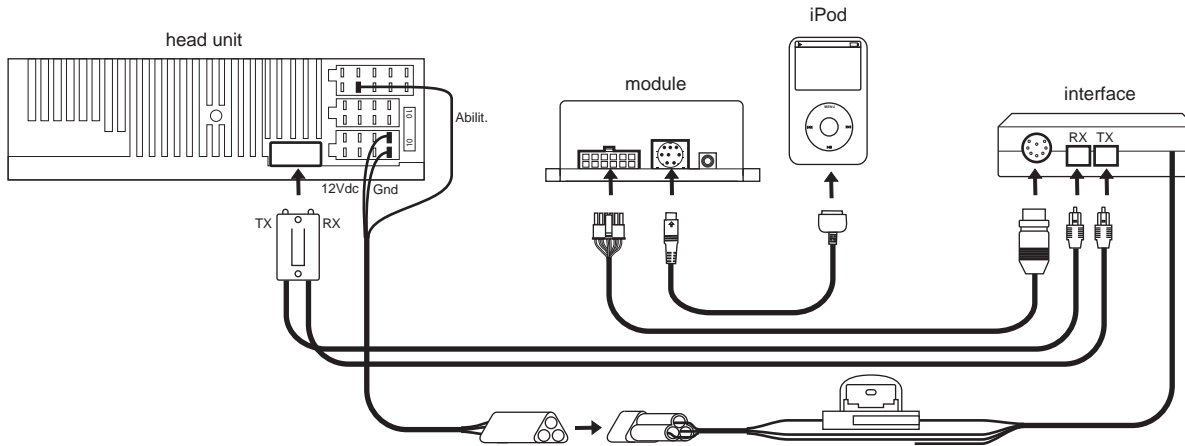


## Connection Diagram

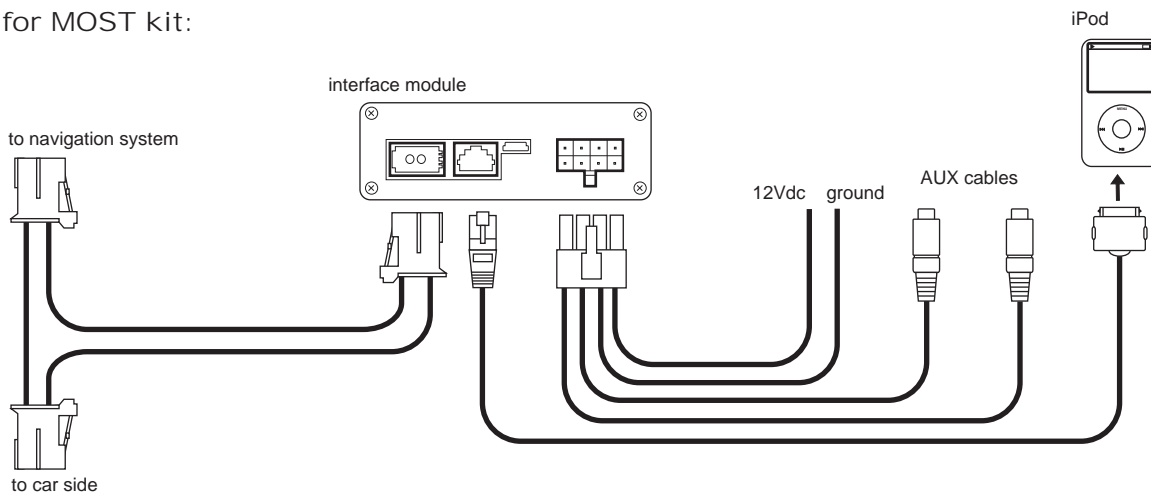
**Note:** further instruction in the installation tips/check list



for D2B kit:

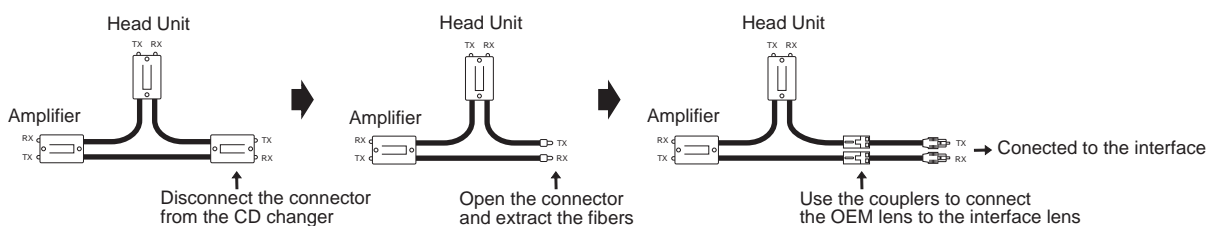


for MOST kit:



## Installation Tips / Check List

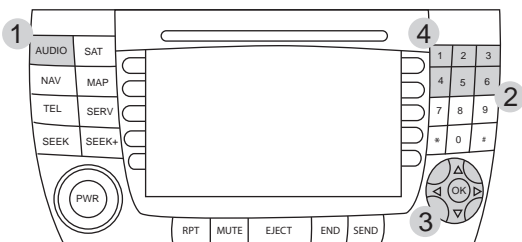
For D2B kit, if the CD changer is present in the vehicle, please follow the steps below:



- ☐ Installation can sometimes easily be done at the CD changer location. Since the CD changer is disconnected anyway, the integration can take place there.

## Operation Overview

MOST navigation radio



- 1 Brings up audio sources on screen. Select CDC.
- 2 Pressing the 6 button brings up the Mode menu (Options/Aux-In). Pressing the 1 button selects the highlighted option.
- 3 Use up/down arrows to scroll through menu options. Use left/right arrows for next/previous track. Center OK button used for selecting highlighted option.
- 4 Buttons 1-5 loads the consecutive selections within the selected category. 1 also pages backward to previous 5 consecutive selections (if available). 5 also pages forward to next 5 consecutive selections (if available).

## Mercedes Specific Technical Notes

for D2B kit:

Problem	Solution
<b>Cannot select the interface from the radio.</b>	Make sure dip switches are set correctly according to the dip switch setting diagram. Use CD button to access the DICE unit. Also check connections, making sure power, ground, and wake-up wires are all attached/tapped in properly.
<b>There is no audio from the iPod source.</b>	Try resetting the iPod and insure that the iPod cable connections are tightly connected.
<b>Audio is present, but controls from radio/steering wheel do not operate iPod.</b>	The unit may be stuck in Auxiliary mode. Select DISC 5 and set to Track 01. Switch back to DISC 1 and try changing track.
<b>The iPod does not charge.</b>	Check all connections. Try resetting the iPod and make sure iPod charges while connected to computer or wall charger.
<b>Music is distorted or sound level is too low.</b>	Make sure all EQ and BASS boost options are turned off on your iPod.
<b>Pressing the next track button only cuts out the audio for a brief second and continues on the same song.</b>	Double-click the next track button or hold the next track button for a little longer and it will skip to the next song.
<b>Unit is connected directly to head unit, but is not being detected.</b>	Make sure the factory CD-Changer (if equipped) is disconnected and by-passed with the fiber-optic cabling.

for MOST kit:

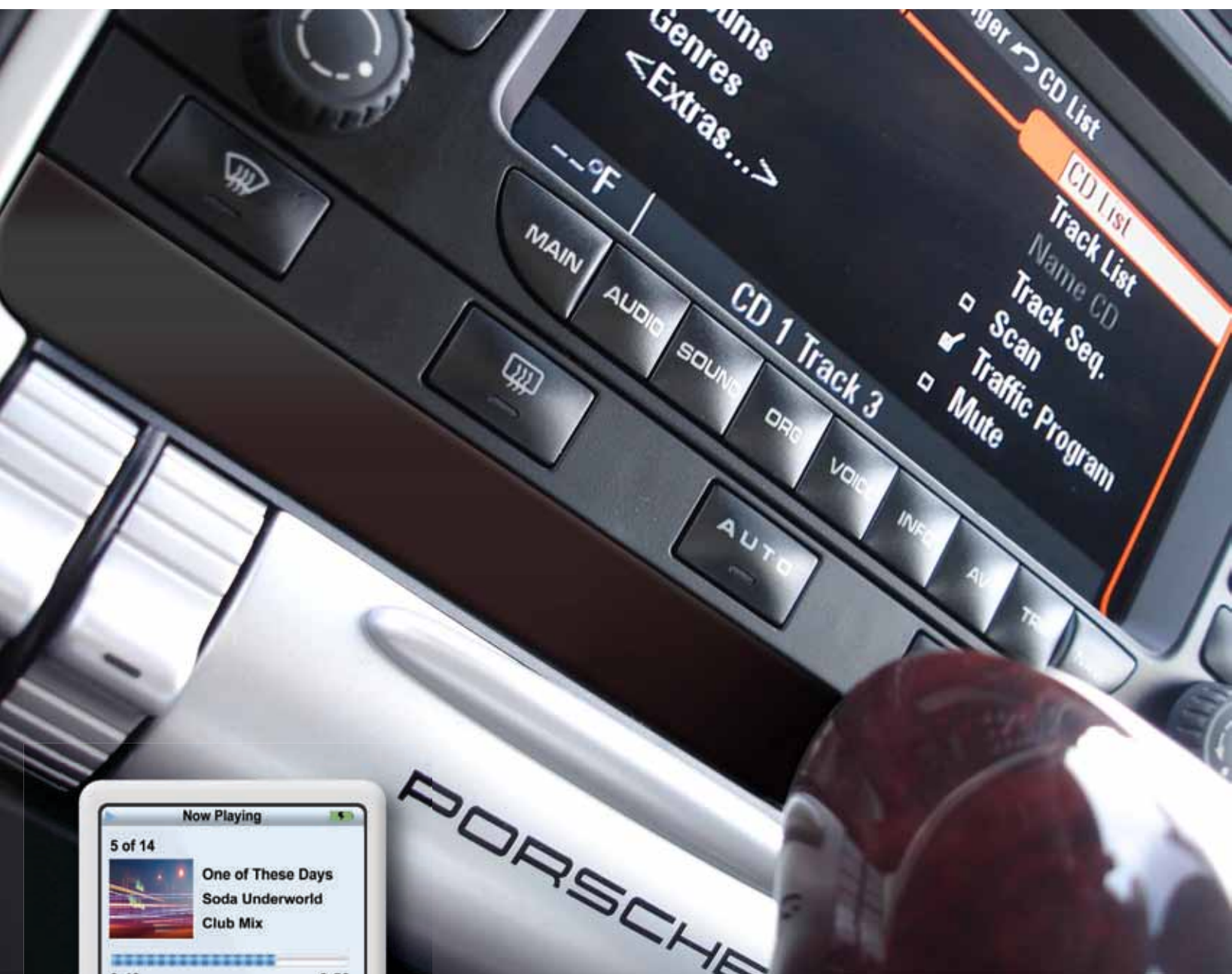
Problem	Solution
<b>My iPod does not charge or synchronize with the DICE system.</b>	Reset the iPod by holding down the Menu button and center button together until the Apple logo appears on screen. New models of iPod may not charge because of altered charging method (4th gen. Nano, 2nd gen. Touch, 3G iPhone).
<b>The navigation screen does not come up with the regular menu, it just stays on the "Mercedes" display and will not operate anything.</b>	This may be because the fiber-optic in and out cables are put in backwards. Just swap the two fiber optic cables in the connector from the DICE kit and the flow of light should be back to normal.
<b>Where do the red and black wires need to be attached to?</b>	The red wire must be connected to Constant 12V power, and the black wire needs to be attached to a ground source.
<b>My navigation system comes on and the sources are operable, however I cannot consistently operate or access the CD-Changer source.</b>	Make sure the factory CD-changer is disconnected and the fiber-optic cables that were disconnected from it are connected to our unit properly.

# PORSCHE



Integration for iPod








# PORSCHE

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits		Universal Kit
			
Porsche	iPod MOST Kit	MOST Note	iPod FM Kit
911			
2007 - 2009	i-Porsche-MOST	1, 2, 3	FMRDS
Boxster			
2003 - 2008	i-Porsche-MOST	1, 2, 3	FMRDS
Carrera			
2003 - 2008	i-Porsche-MOST	1, 2, 3	FMRDS
Cayenne			
2003 - 2008	i-Porsche-MOST	1, 2, 3	FMRDS
Cayman			
2006 - 2008	i-Porsche-MOST	1, 2, 3	FMRDS

#### Notes:

- 2004 models require an additional fiber-optic harness (#800007)
- 1. Only compatible with navigation radio-system.
- 2. CD-changer must be disconnected.
- 3. If CD-changer not present, radio must be programmed for CD-changer by dealer.



## FAQs Before Purchasing the Kit

### Will my factory 6-CD changer be disabled with this unit installed?

Yes, the factory CD changer must be disabled to have the iPod kit integrated into the factory radio system.

### If I do not have a CD-changer factory installed can I still have this integration kit installed?

Yes, however your factory radio will have to be programmed for the radio to recognize our kit as an audio source. This can be done at your local Porsche dealership.

### What kind of information will I see on my PCM display?

You will see Playlists, Artists, Albums, Genre, and songs. These categories show up as lists on the factory navigation screen.

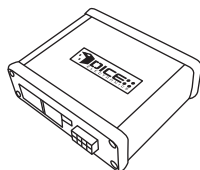
### Can I install this unit myself?

It is recommended that this integration kit be installed by a professional that has experience installing fiber-optic systems. It can be installed directly behind the navigation unit or at the CD-changer location.

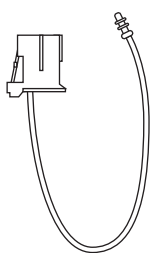
## Content Identifier



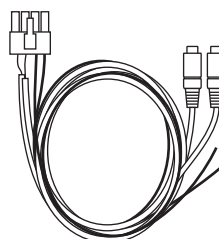
user manual



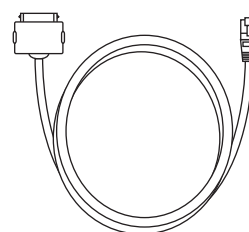
interface module



fiber optic cable

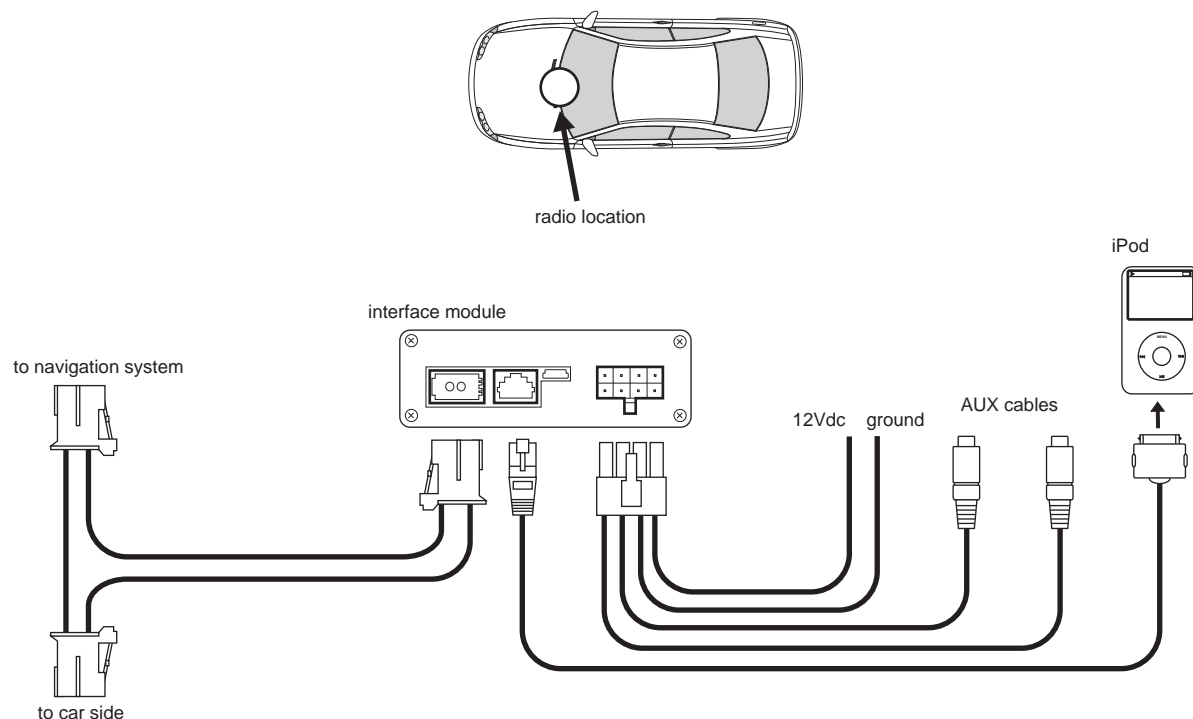


power/AUX cable



iPod docking cable

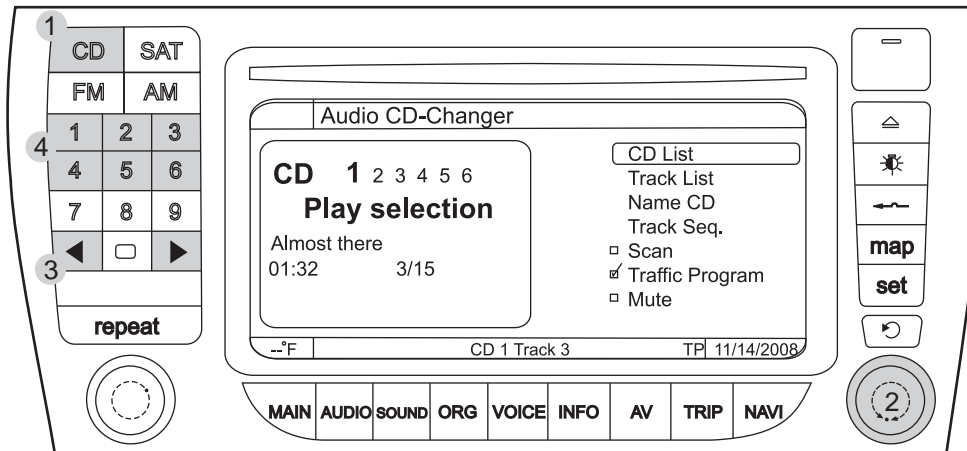
## Connection Diagram



## Installation Tips / Check List

- Installation can sometimes easily be done at the CD-Changer location. Since the CD-Changer is disconnected anyway, the integration can take place there.

## Operation Overview



- 1 Source selector
- 2 Use the jog dial to browse and select lists
- 3 Use the ◀▶ buttons to go to next/previous track. Press and hold the ◀▶ buttons to RW or FFW.
- 4 DISC 1 = Play selection  
DISC 2 = Playlists  
DISC 3 = Artists  
DISC 4 = Albums  
DISC 5 = Genres  
DISC 6 = <Extras...>

### Note:

To change between various modes, you can either select from the CD list or just press and hold preset 1-6.

## Porsche Specific Technical Notes

Problem	Solution
The fiber-optic cables in my 2004 Porsche do not fit the fiber-optic set in the kit, what can I do?	For 2004 model Porsche vehicles, an additional fiber-optic cable set is required (#800007).
There is few seconds of delay when selecting to browse playlists, artists, albums or genre.	This is normal. Loading content from the iPod to the radio takes some time.
The navigation screen does not come up with the regular menu, it just stays on the "Porsche" display and will not operate.	This may be because the fiber-optic in and out cables are put in backwards. Just swap the two fiber optic cables in the connector from the DICE kit and the flow of light should be back to normal.
Where do the red and black wires need to be attached to?	The red wire must be connected to Constant 12V power, and the black wire needs to be attached to a ground source.
My navigation system comes on and the sources are operable, however I cannot consistently operate or access the CD-changer source.	Make sure the factory CD-changer is disconnected and the fiber-optic cables that were disconnected from it are connected to our unit properly.
My iPod does not charge or synchronize with the DICE system.	Reset the iPod by holding down the Medu button and center button together until the Apple logo appears on screen. New models of iPod may not charge because of altered charging method (4th gen. Nano, 2nd gen. Touch, 3G iPhone).

Acura • Audi • Bentley • Buick • BMW • Cadillac • Chevrolet • GMC • Honda • Hummer  
Lexus • Mazda • Mercedes • MINI • Pontiac • Porsche • Scion • Toyota • Volkswagen

See things the way  
they should be...



big and clear.



The ultimate integration for iPod for your car.

[www.diceelectronics.com](http://www.diceelectronics.com) 888.342.3999

iPod • iPod classic • iPod mini • iPod nano • iPod shuffle • iPod touch



# SCION



Integration for iPod











# SCION

vehicle specific integration for iPod

# COMPATIBILITY *chart*

Vehicle	Vehicle Specific Integration Kits			Universal Kit	
					
Scion	iPod (CDC, MD, SAT, MP3) Kit	Note	iPod FM Kit		
xA					
2004 - 2009	i-Toyota-R	1, 2	FMRDS		
xB					
2004 - 2009	i-Toyota-R	1, 2	FMRDS		
xD					
2007 - 2009	i-Toyota-R	1, 2	FMRDS		
tC					
2004 - 2009	i-Toyota-R	1, 2	FMRDS		

Notes:

1. Text display supported on 2003+ vehicles equipped with a CD-text, MP3-text, MD-text, or SAT capable factory radio.
2. External CD-changer must be disconnected. Factory SAT can be retained.



## FAQs Before Purchasing the Kit

### Do I lose functionality of any factory-installed devices in my vehicle that were factory installed?

External CD-changers are disabled. Other factory options can be retained.

### What are the different emulation modes for?

The i-Toyota-R kit offers four different modes to be operated in (CD-changer, Mini-DISC, Satellite, and MP3). Depending on the radio in your vehicle, one or the other will offer TEXT display support.

### If my vehicle's factory radio does not have a text button present, does this mean my radio won't support the text display?

No, it does not. Many late model touch-screen navigation systems in Toyota/Lexus (2005-2008) will have a TEXT button appear on screen to cycle between text fields.

### Will the DICE support video playback on my navigation screen?

No, our iPod kit only transfers the audio and information for the audio through your stereo system.

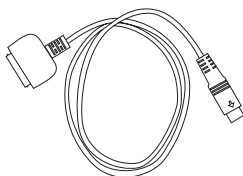
## Content Identifier



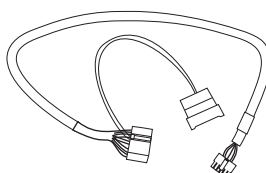
user manual



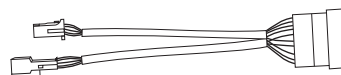
vehicle specific interface module



iPod docking cable



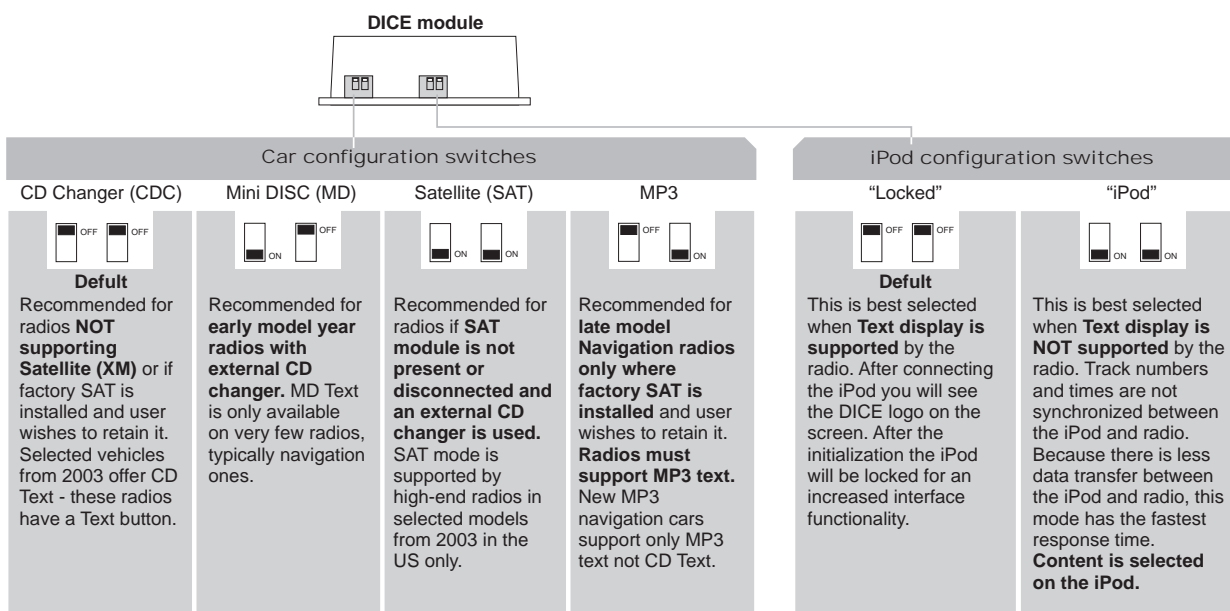
Toyota01 BUS connector



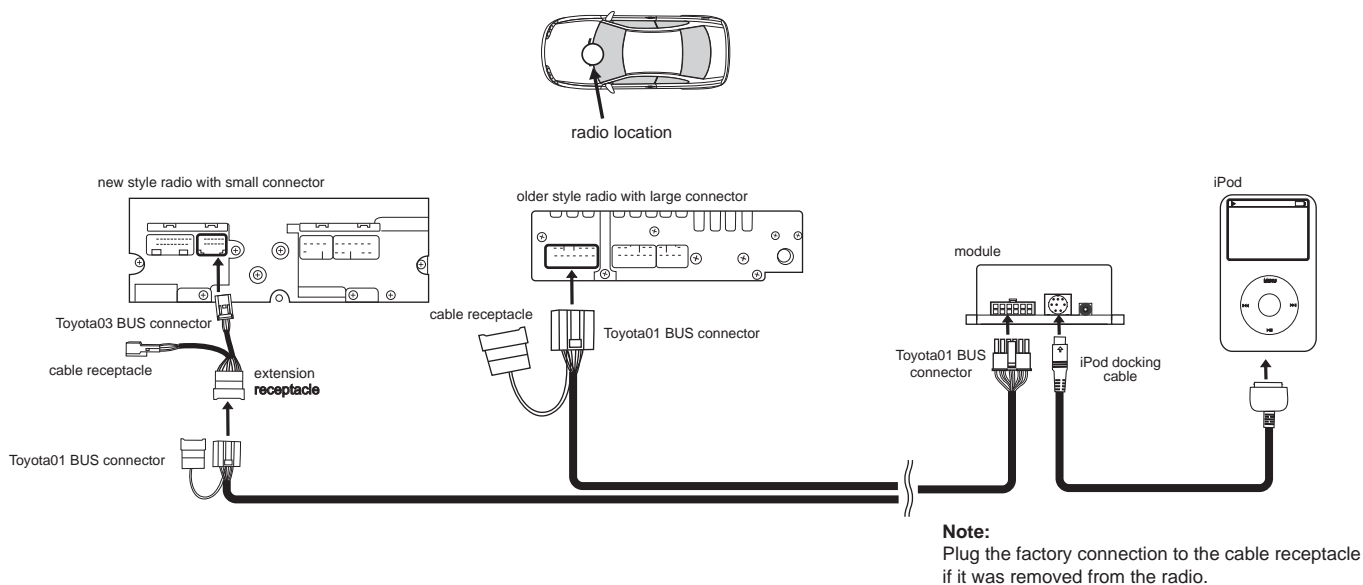
Toyota03 BUS connector

## About Dip Switch Settings

The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



## Connection Diagram



## Installation Tips / Check List

### Identify your audio system

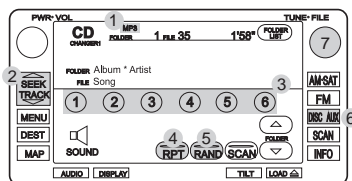
Select the emulation that best suits your vehicle. The following chart identifies the recommended emulation for the listed radios. Note that your vehicle may support more than one type of emulation.

Radios	External CDC	Factory SAT	CDC	MD*	SAT**	MP3
04-06 Tape/CD	not installed or disconnected	not installed	✓	✓	✓	
04-06 Tape/CD	not installed or disconnected	present	✓	✓		
04-06 Tape/CD	present	not installed		✓	✓	
04-06 Tape/CD	present	present		✓		
06-08 MP3 Navigation	not available	not present			✓	✓
06-08 MP3 Navigation	not available	present				✓

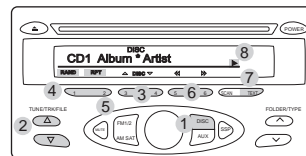
\* Not all radios support MD mode. If an external MD changer is present, it must be disconnected.

- ☐ Setting the DICE unit to SAT mode for a slightly more intuitive interface.
- ☐ Toyota/Lexus/Scion radios are generally held in with 10mm bolts.

## MP3 emulation

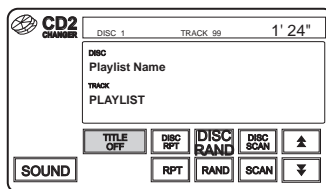
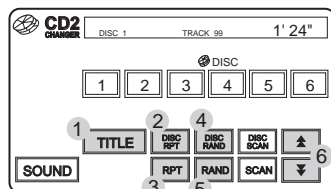


- 1 Source indicator
- 2 Press to change Track.
- 3 Press to select PRESET numbers 1 - 6.
- 4 Press RPT short to repeat one, long to repeat all.
- 5 Press RAND short to Shuffle Songs, long to Shuffle Albums.
- 6 Source selector
- 7 Turn to change Track.



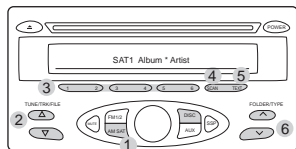
- 1 Source selector
- 2 Press to change Track.
- 3 Press to change modes.
- 4 Press RAND short to Shuffle Songs, long to Shuffle Albums.
- 5 Press RPT short to repeat one, long to repeat all.
- 6 Press to RW or FFW.
- 7 Press the TEXT button to cycle between display fields.
- 8 Arrow shows if additional information is available. Hold TEXT button for more information.

## CDC/MD emulation (with Navigation)



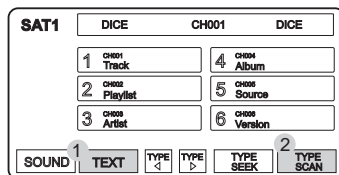
- 1 Press TITLE to toggle between screens.
- 2 Press DISC RPT to Repeat All.
- 3 Press RPT to Repeat One.
- 4 Press DISC RAND to shuffle Albums.
- 5 Press RAND to Shuffle Songs.
- 6 Press to change Track.

## SAT emulation (without Navigation)



- 1 Source selector
- 2 Press to change Track.
- 3 Use Presets to change modes.
- 4 Use Scan to enable Shuffle Songs.
- 5 Press the TEXT button to toggle between available TEXT fields.
- 6 Use the TYPE button to engage/disengage RW or FFW

## SAT emulation (with Navigation)



- 1 Press to TEXT button to toggle between available
- 2 Use TYPE SCAN to enable Shuffle Songs.
- 3 Use the TYPE button to engage/disengage RW or FFW

## Scion Specific Technical Notes

Problem	Solution
Text is not displaying in selected emulation.	Identify your audio system (refer to Installation tip section) first and set switches accordingly. Note that your vehicle may support more than one mode.
Radio/Nav display only shows DISC/Preset and Track/Channel numbers, but there is no iPod control	Select DISC/Preset 5 and make sure it is set to Track/Channel1.
Cannot select the interface.	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface.
Radio/ steering wheel controls do not operate iPod.	Reset iPod and make sure the most recent iPod firmware is installed. Check vehicle user manual on how steering wheel controls work.
The interface operates very intermittently and erratically in SAT mode.	Make sure that if the unit is being operated in SAT mode, the factory satellite tuner is disconnected in the vehicle. Otherwise, the unit will have to be set up in a different emulation mode (CD, MP3, MD).
No audio from iPod source.	Reset the iPod. Verify proper connection to iPod/interface.
iPod does not charge.	Check all connections. See if iPod charges while connected to computer or wall charger. You may need to reset the iPod.
Music is distorted or sound level is too low.	Make sure all EQ and BASS boost options are turned off on your iPod.

# TOYOTA



Integration for iPod





# TOYOTA

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits			Universal Kit
<b>Toyota</b>	<b>iPod Kit</b>	<b>Note</b>	<b>iPod FM Kit</b>	
4-Runner				
2002 - 2009	i-Toyota-R	1, 2, 3	FMRDS	
Camry				
2003 - 2009	i-Toyota-R	1, 3	FMRDS	
Celica				
2003 - 2005	i-Toyota-R	1, 3	FMRDS	
Corolla				
2003 - 2009	i-Toyota-R	1, 3	FMRDS	
Echo				
2000 - 2005	i-Toyota-R	1, 3	FMRDS	
FJ Cruiser				
2006 - 2009	i-Toyota-R	1, 3	FMRDS	
Highlander				
2002 - 2009	i-Toyota-R	1, 3	FMRDS	
Landcruiser				
2002 - 2009	i-Toyota-R	1, 3	FMRDS	
MR2				
2000 - 2005	i-Toyota-R	1, 3	FMRDS	
Prius				
2004 - 2009	i-Toyota-R	1, 3	FMRDS	
Rav4				
2003 - 2009	i-Toyota-R	1, 3	FMRDS	
Sequoia				
2001 - 2008	i-Toyota-R	1, 3	FMRDS	
Sienna				
2003 - 2009	i-Toyota-R	1, 3	FMRDS	
Solara				
2003 - 2009	i-Toyota-R	1, 3	FMRDS	
Tacoma				
2002-2009	i-Toyota-R	1, 3	FMRDS	
Yaris				
2007 - 2009	i-Toyota-R	1, 3	FMRDS	
Tundra				
2002 - 2008	i-Toyota-R	1, 3	FMRDS	

## Notes:

- For model year between 1998 - 2001 please call for legacy support.
- 1. Text display supported on 2003+ vehicles equipped with a CD-text, MP3-text, MD-text, or SAT capable factory radio.
- 2. Not compatible with Navigation on 2004 model OR 2009 Portable Nav option.
- 3. External CD-changer must be disconnected. Factory SAT can be retained.



## FAQs Before Purchasing the Kit

### Do I lose functionality of any factory-installed devices in my vehicle that were factory installed?

Only an external CD-changer needs to be disabled (mainly 2004 and earlier models), other factory options can be retained because of DICE's multi-source integration.

### What are the different emulation modes for?

The i-Toyota-R kit offers four different modes to be operated in for retaining factory options (the mode options are CD-changer, Mini-DISC, Satellite, and MP3). Depending on the radio in your vehicle, one mode or another will offer TEXT display support.

### If my vehicle's factory radio does not have a TEXT button present, does this mean my radio won't support text display?

No, it does not. Many late model touch-screen navigation systems in Toyota/Lexus (2005-2009) will have a TEXT button appear on screen to cycle between text fields.

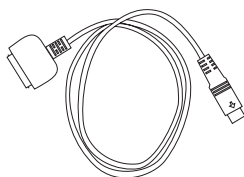
## Content Identifier



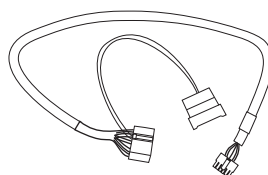
user manual



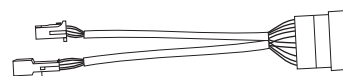
vehicle specific interface module



iPod docking cable



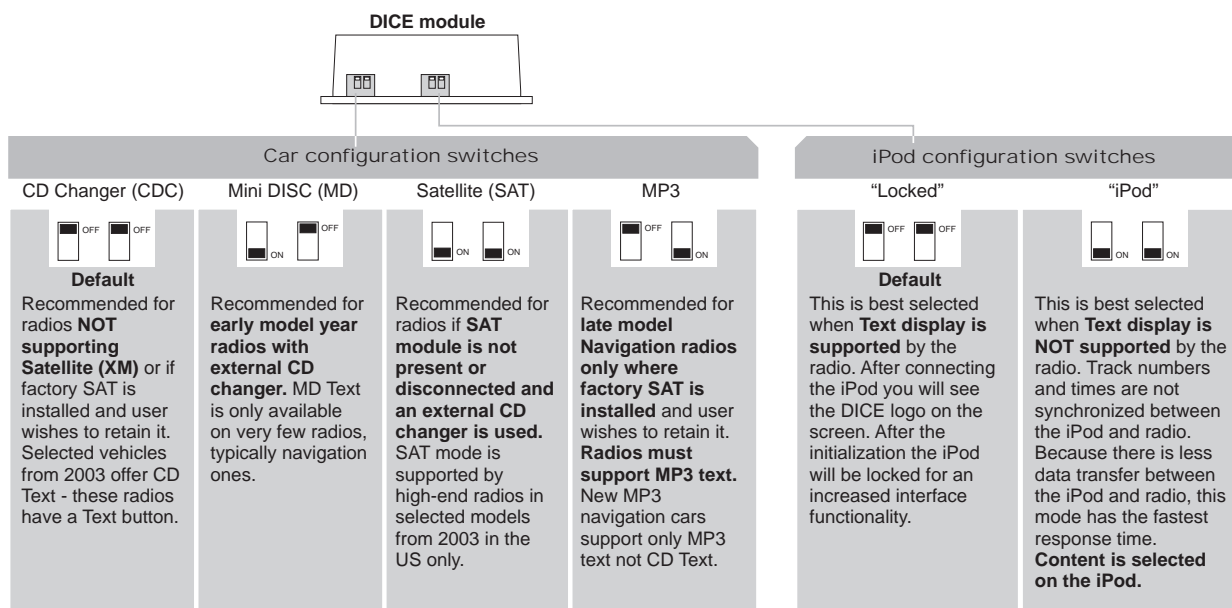
Toyota01 BUS connector



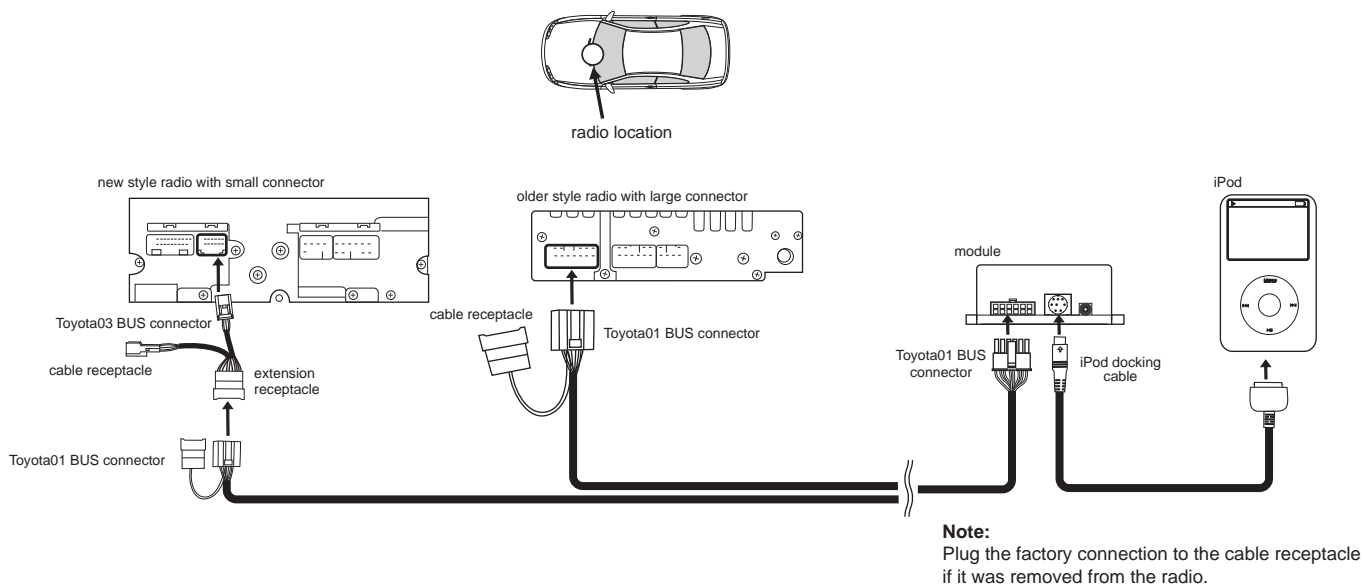
Toyota03 BUS connector

## About Dip Switch Settings

The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



## Connection Diagram



## Installation Tips / Check List

### Identify your audio system

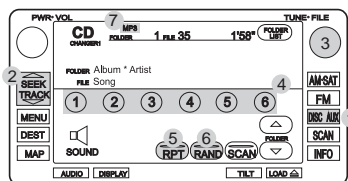
Select the emulation that best suits your vehicle. The following chart identifies the recommended emulation for the listed radios. Note that your vehicle may support more than one type of emulation.

Radios	External CDC	Factory SAT	CDC	MD*	SAT**	MP3
00-02 Tape/in-dash CD	not installed or disconnected	not available	✓	✓		
00-02 Tape/in-dash CD	present	not available		✓		
03-06 Tape/CD	not installed or disconnected	not installed	✓	✓	✓	
03-06 Tape/CD	not installed or disconnected	present	✓	✓		
03-06 Tape/CD	present	not installed		✓	✓	
03-06 Tape/CD	present	present		✓		
06-09 MP3 Navigation	not available	not present			✓	✓
06-09 MP3 Navigation	not available	present				✓

\* Not all radios support MD mode. If an external MD changer is present, it must be disconnected.

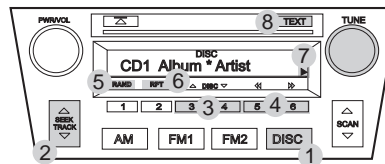
- ☐ Toyota/Lexus radios are generally secured in with 10mm bolts.
- ☐ For 2004-2009 Lexus RX models, after removing the panel in front of the shifter there will be four (10mm) bolts that need to be removed for the radio to slide out. Two are easily visible, but the other two are deeper inside at an upwards angle.
- ☐ Setting up the i-Toyota-R in SAT mode can offer a more intuitive (user-friendly) interface.

## MP3 emulation



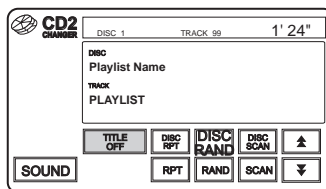
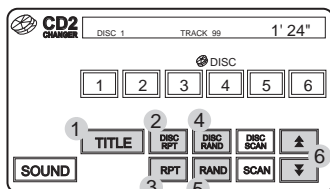
- 1 Source selector
- 2 Press to change Track.
- 3 Turn to change Track.
- 4 Press to select PRESET numbers 1 - 6.
- 5 Press RPT short to repeat one, long to repeat all.
- 6 Press RAND short to Shuffle Songs, long to Shuffle Albums.
- 7 Source indicator

## CDC/MD emulation (without Navigation)



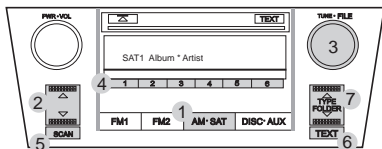
- 1 Source selector
- 2 Press to change Track.
- 3 Press to change modes.
- 4 Press to RW or FFW.
- 5 Press RAND short to Shuffle Songs, long to Shuffle Albums.
- 6 Press RPT short to repeat one, long to repeat all.
- 7 Arrow shows if additional information is available. Hold TEXT button for more information.
- 8 Press the TEXT button to cycle between display fields.

## CDC/MD emulation (with Navigation)



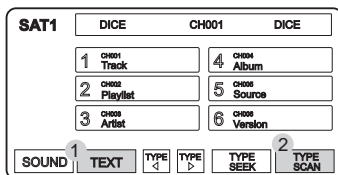
- 1 Press TITLE to toggle between screens.
- 2 Press DISC RPT to Repeat All.
- 3 Press RPT to Repeat One.
- 4 Press DISC RAND to shuffle Albums.
- 5 Press RAND to Shuffle Songs.
- 6 Press to change Track.

## SAT emulation (without Navigation)



- 1 Source selector
- 2 Press to change Track.
- 3 Turn to change Track.
- 4 Use Presets to change modes.
- 5 Use Scan to enable Shuffle Songs.
- 6 Press the TEXT button to toggle between available TEXT fields.
- 7 Use the TYPE button to engage/disengage RW or FFW

## SAT emulation (with Navigation)



- 1 Press TEXT button to toggle between mode screen and title screen
- 2 Use TYPE SCAN to enable Shuffle Songs
- 3 Use the TYPE button to engage/disengage RW or FFW

## Toyota Specific Technical Notes

Problem	Solution
Text is not displaying in selected emulation.	Identify your audio system (refer to Installation tip section) first and set switches accordingly. Note that your vehicle may support more than one mode.
Radio/Nav display only shows DISC/Preset and Track/Channel numbers, but there is no iPod control	Select DISC/Preset 5 and make sure it is set to Track/Channel1.
Cannot select the interface.	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface.
Radio/ steering wheel controls do not operate iPod.	Reset iPod and make sure the most recent iPod firmware is installed. Check vehicle user manual on how steering wheel controls work.
The interface operates very intermittently and erratically in SAT mode.	Make sure that if the unit is being operated in SAT mode, the factory satellite tuner is disconnected in the vehicle. Otherwise, the unit will have to be set up in a different emulation mode (CD, MP3, MD).
No audio from iPod source.	Reset the iPod. Verify proper connection to iPod/interface.
iPod does not charge.	Check all connections. See if iPod charges while connected to computer or wall charger. You may need to reset the iPod.
Music is distorted or sound level is too low.	Make sure all EQ and BASS boost options are turned off on your iPod.

# VOLKSWAGEN



Integration for iPod





# VOLKSWAGEN

vehicle specific integration for iPod



# COMPATIBILITY chart

Vehicle	Vehicle Specific Integration Kits				Universal Kit
<b>Volkswagen</b>	<b>iPod CDC Kit</b>	<b>CDC Note</b>	<b>iPod SAT Kit</b>	<b>SAT Note</b>	<b>iPod FM Kit</b>
Beetle					
2004 - 2008	i-VW-R	1, 2, 5	i-Audi/VW-SAT	3, 4	FMRDS
EOS					
2006 - 2008	i-VW-R	1, 2, 5	i-Audi/VW-SAT	3, 4	FMRDS
Golf/GTI/R32					
2005 - 2008	i-VW-R	1, 2, 5	i-Audi/VW-SAT	3, 4	FMRDS
2002 - 2004	i-VW-R	1, 2, 5	N/A		FMRDS
Jetta					
2005 - 2008	i-VW-R	1, 2, 5	i-Audi/VW-SAT	3, 4	FMRDS
2002 - 2004	i-VW-R	1, 2, 5	N/A		FMRDS
Passat					
2005 - 2008	i-VW-R	1, 2, 5	i-Audi/VW-SAT	3, 4	FMRDS
2002 - 2004	i-VW-R	1, 2, 5	N/A		FMRDS
Rabbit					
2006 - 2009	i-VW-R	1, 2, 5	i-Audi/VW-SAT	3, 4	FMRDS
Touareg					
2004 - 2008	i-VW-R	2, 5, 6	i-Audi/VW-SAT	3, 4	FMRDS

Note:

- Standard kit requires that factory satellite be disconnected. Wiring harness must be modified to retain satellite radio.  
See diagram on "Installation Tips/Check List" on the following pages.
- No Text display.
- The radio must have a SAT button.
- Text display supported.
- External CD-changer is disabled.
- 2008 Touareg does not accept the harness modification, satellite radio must be disabled.



Volkswagen

## FAQs Before Purchasing the Kit

### Is factory satellite radio retainable in my Volkswagen?

Yes, with the i-VW-R the satellite radio can be retained by removing three wires from the factory connector and plugging them into our connector. Please check Installation Tips/Check List.

### How can I tell if my VW radio will support the text-capable i-Audi/VW-SAT kit?

If your factory VW radio has a SAT button present, it is compatible with our i-VW-SAT and will support text display.

### Where is the Satellite tuner located in my vehicle?

On VW vehicles, the SAT tuner is normally located either under the front passenger seat or in the trunk behind the trunk lining.

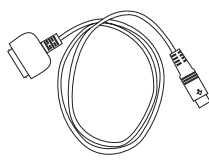
## Content Identifier



user manual

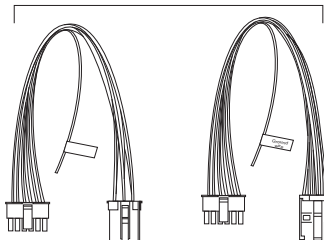


vehicle specific interface module



iPod docking cable

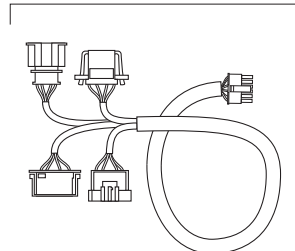
for i-VW-R kit:



VW-R1  
harness  
(blue)

VW-R2  
harness  
(white)

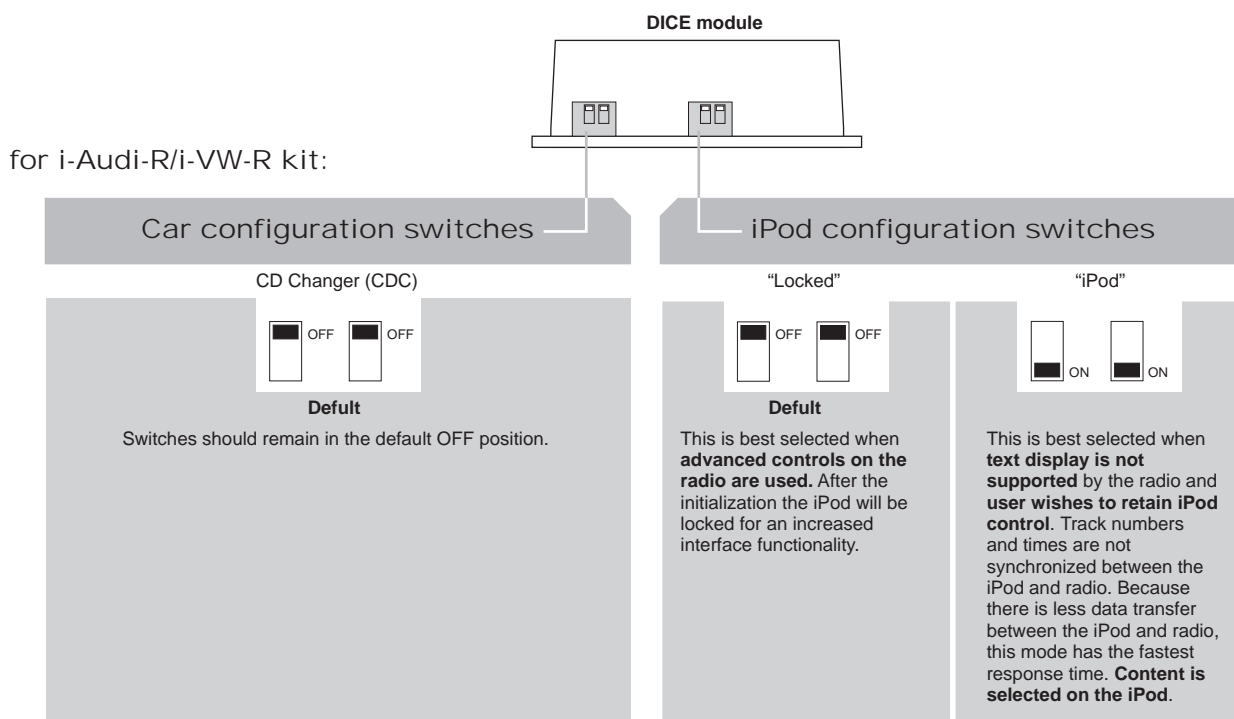
for i-Audi/VW-SAT kit:



i-Audi/VW-SAT harness





## About Dip Switch Settings

The configuration switches located on the DICE module are used to set the operation of the interface by the installer. Incorrect dip switch settings may cause the DICE interface not to work properly or not to operate at all. **Disconnect the vehicle harness from module and cycle ignition off for 50 seconds after changing the switches!**



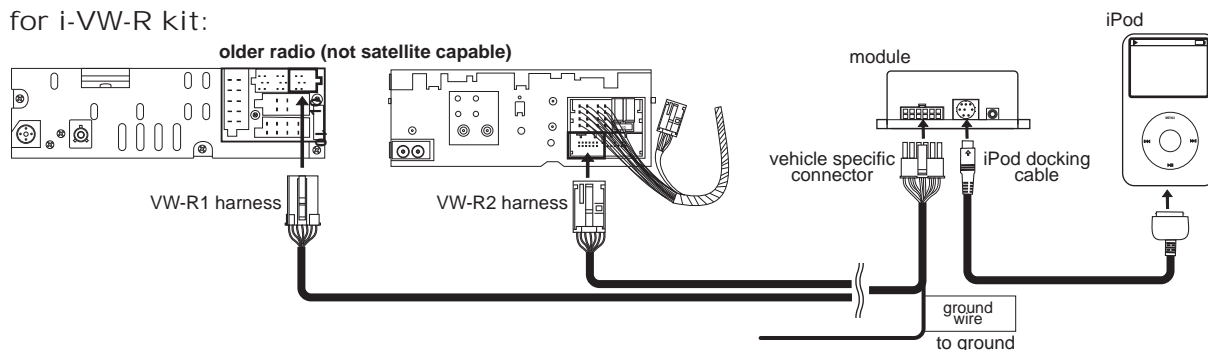
## (About Dip Switch Settings continued)

for i-Audi-SAT kit:

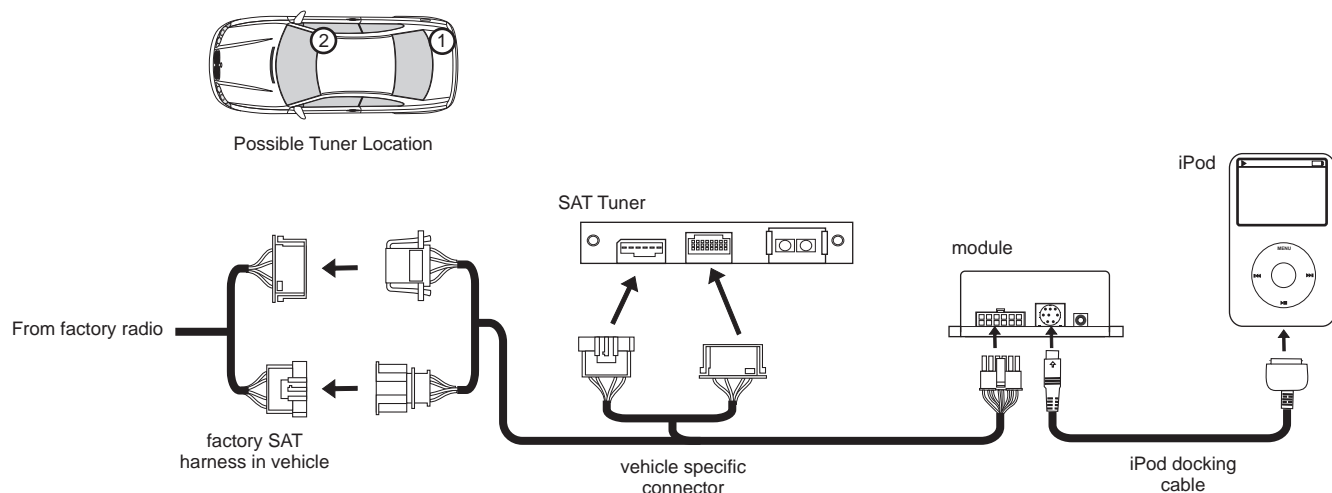
Car configuration switches		iPod configuration switches	
<b>Multi-line display</b>  <b>Default</b> This is the recommended setting for <b>radios that have multiple text fields displayed in Satellite emulation mode.</b>  This type of emulation provides <b>full text display</b> on the radio. If Satellite (XM/Sirius) is equipped it must be disconnected to operate integration in this emulation mode. <b>XM/Sirius receiver is usually located in the trunk or under the passenger seat.</b> <b>Note:</b> Please call to confirm vehicle support prior to installation.	<b>Single-line display</b>  This setting is recommended for <b>radios where there is only 1 text field displayed in Satellite emulation mode.</b>	<b>"Locked"</b>  <b>Default</b> It is best selected when <b>text display is supported</b> by the radio. After connecting the iPod you will see a logo or a checkmark indicating that the iPod is locked. After the initialization the iPod will be locked for an increased interface functionality.	<b>"iPod"</b>  It is best selected when <b>text display is NOT supported</b> by the radio. Track numbers and times are not synchronized between the iPod and radio. Because there is less data transfer between the iPod and radio, this mode has the fastest response time. <b>Content is selected on the iPod.</b>

## Connection Diagram

for i-VW-R kit:



for i-Audi/VW-SAT (retains satellite radio) kit:



## Installation Tips / Check List

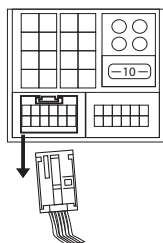
- ☐ For the wiring harness(es) that plug into the back of the radio, the ground wire can be attached to the extended screw on the back of the radio for a sufficient ground point.
- ☐ Earlier model VW's (2001-2005) can be easily removed with proper radio removal keys.
- ☐ With the non-text i-VW-R, the kit will be more user-friendly when installed in iPod mode because it will keep the direct iPod controls unlocked.
- ☐ 2006-2008 Jetta and Golf have the same dash setup which makes the installation process similar. The trim around the radio needs to be popped off first, then the top vent. The screws needed to be removed are Torx size T15.

**(Installation Tips/Check List continued)**

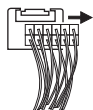
## Cable modification (only for i-VW-R):

- If vehicle is equipped with factory Satellite radio and desired to be retained, a harness modification is required
- 2008 Touareg does not accept this modification, satellite radio must be disabled.

1. Disconnect main radio harness and locate SAT connector. Remove it from main harness by pressing on the release tab of the SAT connector.



2. Slide out the inner part of the SAT connector from plastic housing.



3. Disassemble the VW-R2 connector the same way as the factory SAT connector.



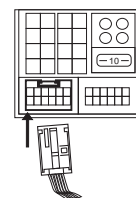
4. Remove the SAT wires from the factory connector by releasing the pins with a small screw driver or ball-point pen.



5. Relocate wires to VW-R2 connector keeping the same order and location.



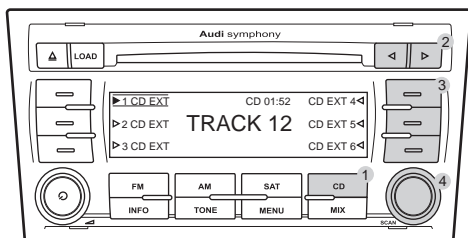
6. Put plastic connector covers back on. Insert VW-R2 connector to factory VW main harness.



7. Connect ground wire to chassis of radio.

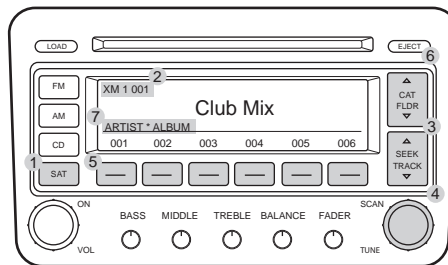
**Operation Overview**

## CDC emulation



- 1 Source selector
- 2 Press to change Track, hold to Rewind or Forward.
- 3 Press to change DISC.
- 4 Turn to change Track.

## SAT emulation



- 1 Source selector
- 2 Source indicator
- 3 Press to change track.
- 4 Turn to change track.
- 5 On selected radios you may use these buttons to select Modes 1-6
- 6 Press to cycle through Modes 1-6.
- 7 This text field may not be shown on all radios.

**Volkswagen Specific Technical Notes**

Problem	Solution
Cannot select the interface.	Check DIP switch settings. With the ignition OFF disconnect vehicle harness from module for a few seconds and reconnect. Verify that the correct button is used to access the interface (CDC or SAT).
Radio/ steering wheel controls do not operate iPod.	Reset iPod and make sure most recent iPod firmware is installed. Check vehicle user manual on how steering wheel controls work.
Radio/ steering wheel controls do not operate iPod, but audio is still present.	Select DISC/Mode 5 and Track/Channel 1. Switch back to DISC/Mode 1 and try changing Tracks. DISC5 (Mode 5) Track 02 (Channel 02) is AUX mode and not correct for the iPod.
Interface has erratic recognition or none at all.	Make sure that the ground wire harness is attached to back of radio.
No text display.	Set iPod switches to OFF for "Locked" mode. Text display is only supported on SAT-capable radios, with the i-Audi/VW-SAT kit
No audio from iPod source.	Reset the iPod. Verify proper connection to interface.
iPod does not charge.	Check all connections. Reset iPod and make sure iPod charges while connected to computer or wall charger.
Music is distorted or sound level is too low.	Check and make sure all EQ and BASS boost options are turned off on your iPod.
Correct DIP switch settings, but still no text display.	Select DISC 6 to set text output to the correct location.

# AUX universal integration

## The perfect solution for aftermarket head units.

DICE AUX kits target specialty installers who want to have a high quality audio output from an iPod and need an additional AUX input. This product offers an easy upgrade path to customers who use third party vehicle interfaces for SAT radio integration and now want an iPod without losing the existing SAT integration. For users of aftermarket head units featuring direct audio input, this solution delivers rock solid audio from the iPod. The extra AUX port allows the connection of other MP3 players or any other audio device. 5 volt (USB) charge circuitry is built in to support even the latest iPod/iPhone models!

## FAQs Before Purchasing the Kit

### How is the DICE Aux kit different from the car's factory AUX jack?

The DICE kit offers 5 volt (USB) charge of the iPod, allows for audio level matching / adjustment, and employ isolation amplifiers to remove any digital noise caused by the hard drive and communication.

### If my radio system has only a 3.5mm auxiliary input, can I still connect the DICE AUX kit?

Yes, however an additional audio cable is required that connects from RCA output to 3.5mm mini-jack.

### Is there any control offered from the radio?

Volume control must be adjusted from the radio/steering wheel. Other controls are done directly through the iPod.

### Since all music control is done through the iPod directly, where is the best location for the iPod?

Generally, routing the iPod cable to the center console provides the easiest access to the iPod. However, with our iPod cradle you can have the iPod mounted right on the dash for the simplest accessibility.

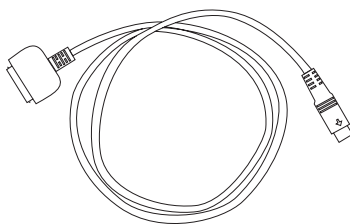
## Content Identifier



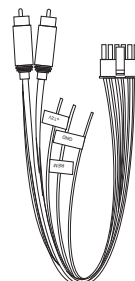
user manual



vehicle specific interface module



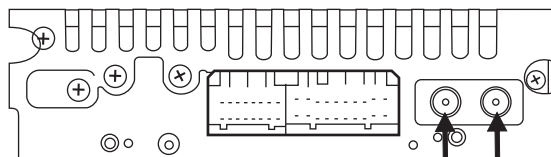
iPod docking cable



AUX audio/power cable

## Connection Diagram

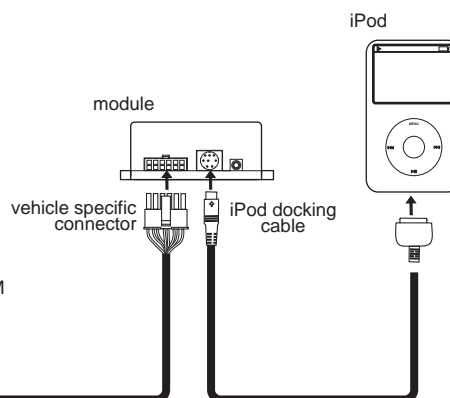
AUX Radio



**Note:** some radios will not have RCA inputs and will require custom installation.

+12V GND REM

RCA connectors:  
-Red: Right channel  
-White: Left channel



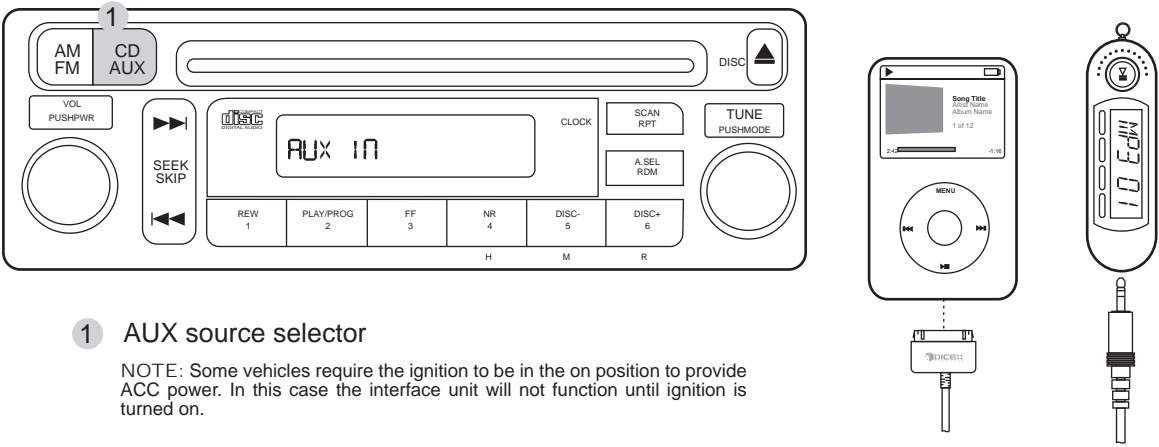
# Benefits of the DICE AUX kit

- 5V USB iPod charging is supported as well as the original 12V firewire charging
- Signal conditioning is implemented that removes noise from the iPod
- Connect any other audio device to AUX input
- When the iPod is disconnected, an automatic switch initiates the auxiliary input on the DICE module
- Dual potentiometers are integrated into the DICE module for setting desired iPod and AUX audio levels

# Operation Overview

## Using the AUX integration

Connect the iPod to the dock cable and select the auxiliary source on the radio. The charging indicator should appear on the iPod and a selected song will start to play. If an additional audio device is connected through the 1/8" mini-jack, it will become active when the iPod is disconnected.



### 1 AUX source selector

NOTE: Some vehicles require the ignition to be in the on position to provide ACC power. In this case the interface unit will not function until ignition is turned on.

# Auxiliary Specific Technical Notes

Problem	Solution
iPod and auxiliary input sound levels are much different.	Adjust sound level through potentiometers on DICE module.
iPod will not stop charging if left connected with the vehicle shut off.	Make sure the ignition wire (REM) is attached to a 12V switched source so that the DICE unit receives a shut-off signal.
Auxiliary device is connected to the 3.5mm mini-jack, but the iPod continues to play.	The iPod must be disconnected for the auxiliary input on the DICE module to be activated.

# Enhanced browsing features.

SILVERLINE

## DICE Silverline car integration kit for iPod

Factory integration for iPod from DICE! Connect your iPod to your vehicle's factory entertainment system and hear what an iPod should sound like in your car. The new Silverline series offers new features including browsing by Album and a quick browse and select feature that lets you easily skip through songs in those endless playlists.

### Supported iPod models\*:



\*For complete iPod compatibility, please visit us online

## Main Features



### CD-text display on all compatible BMW radio systems

Displays currently playing song and artist on the screen of the radio



### CD quality audio output

Hard-wired connection allows for the highest possible sound quality



### AUX input

Connect additional audio devices through the 1/8" AUX input



### Integrated controls

Control the iPod directly from the radio or steering wheel



[www.diceelectronics.com](http://www.diceelectronics.com)

888.342.3999



Copyright 2008 DICE Electronics, LLC. All Rights Reserved. iPod is a registered trademark of Apple, Inc. Specifications listed may change without notice. Please visit us online for vehicle compatibility.



# Yes, it's compatible!



## universal integration FM-RDS

### No car is left behind.

We are proud to be the first to introduce universal integration solutions using FM RDS technology that features both wireless and wired connectivity. The DICE FM-RDS kit for iPod features a fully digital FM transmitter which delivers deeper base and sharper highs. The plug & play kit includes a “self-install” cable that connects to the standard 12V DC outlet of any car. This enables users to listen to their iPod right away! For those craving the ultimate static and interference-free experience, the hardwired “pro-install” cable satisfies their hunger!

## FAQs Before Purchasing the Kit

### How do I know the DICE FM-RDS can connect to my vehicle's head unit?

If your vehicle's head unit supports FM radio, an antenna connection will be available. Antenna adapters (sold separately) may be required for proper connection.

### How can I tell if my radio supports RDS-text?

RDS-capable radios may have an "RDS" logo stamped on the face of it or an RDS button. If neither are present, you can tune to a popular FM station to verify if any RDS information shows up on the display (station name, song/artist names, etc.).







### Between the Self-install and Pro-install FM-RDS kits, what reason(s) would I pick one over the other?

With the Self-install, you can plug it into the 12V DC outlet in a matter of seconds! The Pro-install kit offers static-free and interference-free audio and is hidden in the vehicle since it is installed behind the radio.

### With the DICE FM-RDS kit, is my regular FM radio affected?

No, you can still use your regular radio and tune through all the stations with the iPod disconnected.

The DICE FM-RDS kit is the first to offer static free, hard-wired integration for iPod creating unparalleled audio quality in the market. The FM-RDS kit is compatible with all iPod models and provides text display on RDS capable radios.

Compatibility		Company 1	Company 2	Company 3
				
iPod mini	✓	✓	✓	✓
iPod nano	✓	✓	✓	✓
iPod nano 2nd	✓	✓	✓	✓
iPod nano 3rd	✓	✓	✓	✓
iPod nano 4th Gen.	✓			
iPod 4th Gen. color	✓	✓	✓	✓
iPod 5th Gen. (video)	✓	✓	✓	✓
iPod Classic	✓		✓	✓
iPod Touch	✓		✓	✓
Feature				
RDS support	✓			
Transmits over the air	✓	✓	✓	✓
Direct wired install	✓			
iPod charging	✓	✓		✓
Optional iPod cradle	✓			
Static free	✓			
Hidden installation	✓		✓	

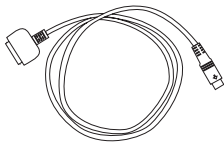
• Comparison data based on products available as of Summer, 2008



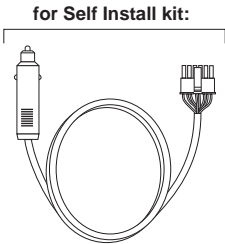
user manual



vehicle specific interface module



iPod docking cable



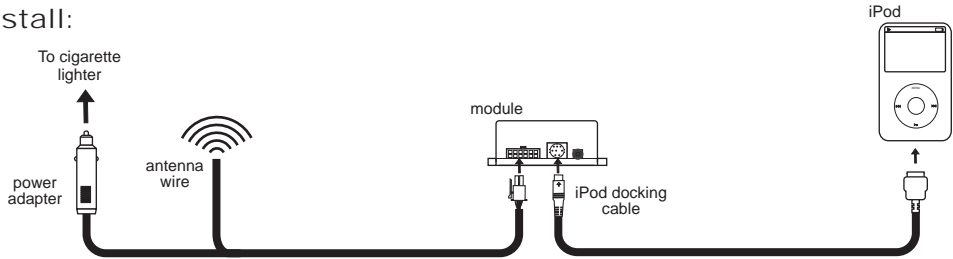
plug and play antenna/ power adapter  
(Not available outside US/Canada markets)



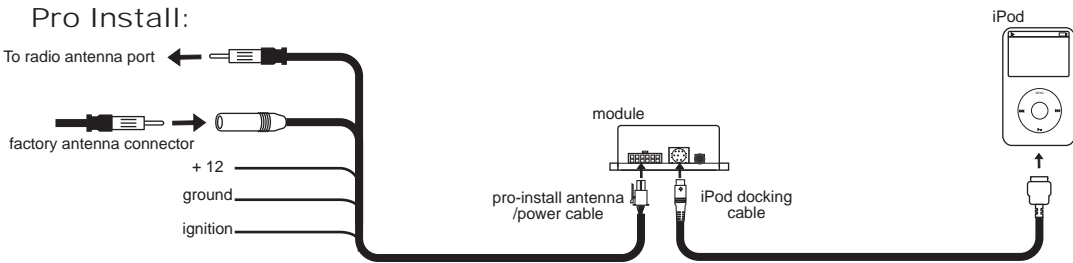
pro-install antenna/power cable

Connection Diagram

Self Install:

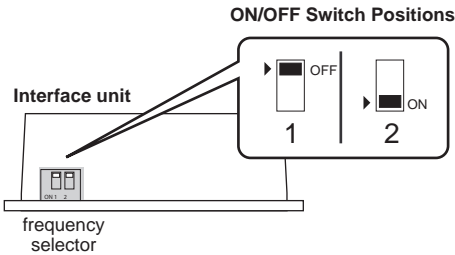


Pro Install:



Installation Tips / Check List

Frequency configuration settings:



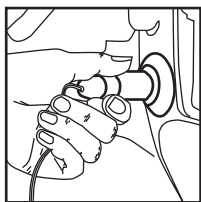
FM (MHz)	Dip switch 1	Dip switch 2
88.7	OFF	OFF
93.3	ON	OFF
97.5	ON	ON
107.7	OFF	ON

- Note:**
- 1. Disconnect the vehicle harness from module and cycle ignition off for 5 seconds after changing the switches.
  - 2. Try to select a transmitting frequency that is not occupied by a local FM radio station.

- ☐ With the Pro-install kit, easy access to 12V constant/switched power can be found at the 12V DC outlet.
- ☐ If T-taps are being used for splicing power/ground, make sure the correct size T-taps are used so it has good contact with the wiring. Loose wire will cause unexpected operation.

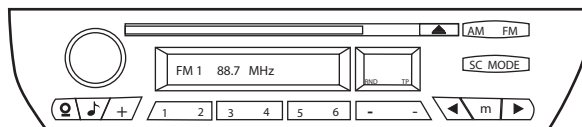
## Operation Overview

### Plug and Play Operation Overview:



1. Plug the power adapter into a cigarette lighter socket.

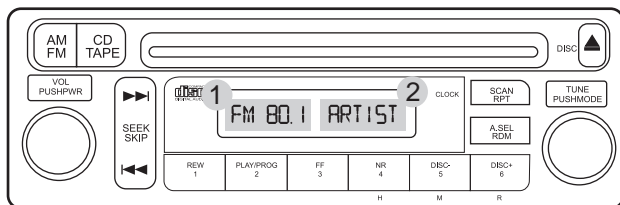
Note: Many radio support RDS/RDBS. Using the FMRDS kit will display song text information, but will not allow radio control.



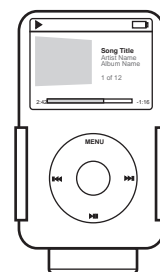
2. Turn on the radio and tune to the FM frequency that was selected on the module. Connect the iPod to the dock cable. Select and start to play a song and the music should now be playing through the factory radio.

### Pro-install Operation Overview:

Select the FM radio source on the radio and tune to the frequency that was selected on the interface unit. As soon as the radio is tuned to the appropriate frequency, audio from the iPod will be heard.



- 1 FM frequency
- 2 RDS text



### About RDS:

Radios with RDS capability allow the currently playing song title and artist name to be displayed on the screen of the radio. To find out if a radio has RDS, tune to a popular radio station and if the station name is displayed then the radio has RDS capability.

## FM-RDS Universal Integration Specific Technical Notes

Problem	Solution
With the pro-install kit, I get static on any of the selected presets.	The vehicle's ignition may need to be started to supply power to the DICE unit. If there is still static, try another 12V power source.
The iPod will not stop charging if I leave it connected and shut off my vehicle.	Make sure the Ignition wire (IGN) is attached to a 12V switched source so that the DICE unit is receiving a shut-off signal.
With the self-install kit, is there any way to reduce static or interference?	Try relocating or adjusting the position of the DICE module/antenna closer to the factory antenna.



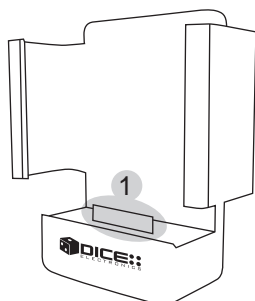
# ACCESSORY

## **DICE cradle for a more convenient and safer ride.**

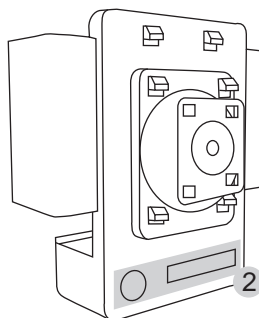
The DICE Cradle for iPod unites all the features that a holder can possibly have. This docking Cradle with its sleek design blends like it is part of your car. The cradle can be mounted almost anywhere thanks to its unique ball-and-cup mount solution, allowing it to be angled and rotated. This Cradle is the only solution on the market that includes interchangeable iPod holders to perfectly match the fit and style of the iPod models including 3G/4G, Photo, Video, Classic, Touch, mini and nano.

## Cradle for iPod

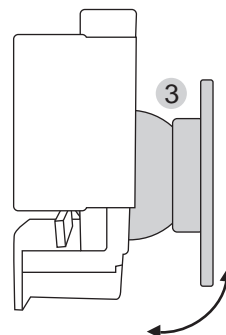
\* video out of recent iPod models require authentication which must be done by external interface.



- 1 Built in dock connector provides a quick, high quality connection.



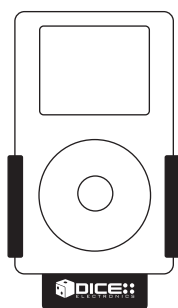
- 2 Dock cable receptacle and 1/8" video out jack\*



- 3 AMPS mounting pattern pivots +/- 45° in all direction for easy mounting

## Interchangeable Holder

Variety of spacer and mount are included to support:

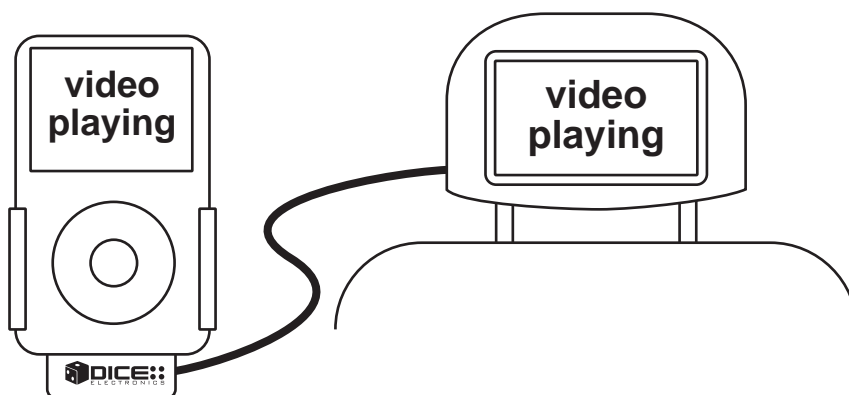


iPod 3G  
iPod 4G & Classic  
iPod Photo & Video  
iPod mini



iPod nano 1G  
iPod nano 2G

## Video Output



The DICE video cradle can be mounted almost anywhere thanks to its unique ball and cup mount solution, allowing it to be angled 70° and rotated 360°. Featuring a universal iPod dock connector and 1/8" video out jack for use with the 5th gen. iPod. An iPod compatible video cable can be used to connect the DICE video cradle to a TV screen.



# HOME audio

## From the road to your home

After several successful years in the automotive industry, we are proud to present our home audio products: the iTR-100, tabletop HD Radio receiver and the iTPA-220 vacuum tube amplifier system. The iTR-100 fills the space with crystal clear digital HD Radio while its HD multicast capability allows listeners to enjoy more content broadcasted simultaneously from their local radio stations. The tube amplifier system integrates the iPod and adds true audiophile-satisfying, rich and warm tone to the digital sound. Not only do these products provide great features, they both accent every home and office decor.

# How does music move you?



## iTPA-220

Vacuum Tube Amplifier System for iPod

2x20  
WATTS

AUX  
INPUT

REMOTE

6N3  
VACUUM  
TUBES

# Sound travel to the *future*

## Specification list

Power output	2x5 Watts RMS
Driver	4" full range driver
Impedance	4Ohms
Frequency response	40 Hz - 18kHz
Inputs	1/8" for optional spkr
Outputs	1/8" AUX, RF, AM loop ant.
Height	5.50"
Width	9.75"
Depth	5.25"
Station memory	10 presets for AM, FM and HD1, 2, 3
Tuner type	AM / FM / HD Radio tuner

DICE is introducing the DICE iTR-100 tabletop HD Radio receiver. Thanks to the solid construction of the acoustic wood structure, you can enjoy the enhanced sound quality of HD Radio at home or in your office. With its classic retro design, the receiver accents any space.

## features

- AM/FM HD Radio receiver - Listen to AM channels in FM quality and FM channels in near CD quality
- HD multicast compatible - Enjoy more content simultaneously broadcasts from your local radio stations
- HD station seek - Quickly find and tune into available HD Radio stations in your area
- Excellent acoustic performance - The solid construction of the acoustic wood structure further enhances the listening experience
- Alarm clock - Start your morning with your favorite HD radio station



iTR-100

desktop HD radio receiver

iTR-100

## FAQs Before Purchasing the iTR-100

### What does HD Radio have to offer?

- Your favorite local station in the same place on the radio dial, but provides dramatically higher audio quality through digital reception of AM and FM stations.
- More content, more program choices via HD2 and other multicast channels.
- Program text information may include titles, artists, album info and even weather
- HD Radio is subscription free!

### Where can I find HD Radio stations?

HD radio stations are all across the country and all you need is this HD Radio receiver to enjoy it. Approximately 1,500 HD Radio stations broadcast HD Radio programming nationwide. There are over 2,500 channels of music, including multicast stations featuring your favorite local news, sports and music programs. To find out which stations broadcast in HD in your area, visit [www.hdradio.com](http://www.hdradio.com)

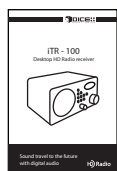
### What is Multicasting?

HD Radio technology enables an FM broadcaster to offer more than one program stream on its existing frequency. Simultaneously, one station can offer several audio channels as well as program associated text information. Stations may transmit one channel of music and one of news, or even two different music programs. Be prepared to experience new music and news formats, showcases by young artists and local bands, or even foreign language programs.

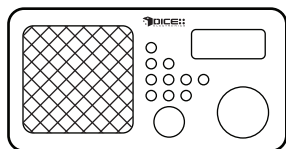
### What can I do to improve reception of distant radio stations?

Try to reposition the antenna, or for better reception you may purchase an optional amplified or roof top antenna.

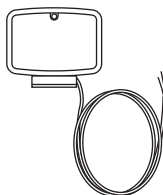
## iTR-100 Content Identifier



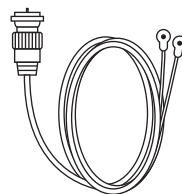
user manual



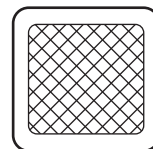
iTR-100 unit



AM loop antenna



FM wire antenna



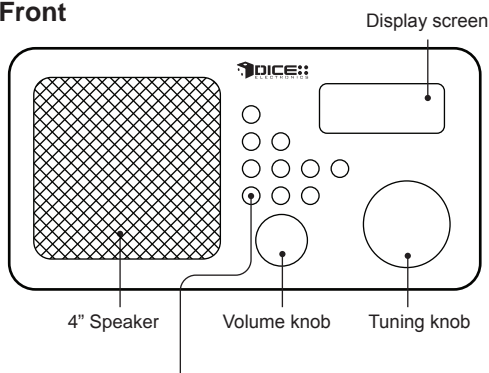
optional speaker  
(sold separately)



Removable  
telescope  
antenna

## Connection Diagram

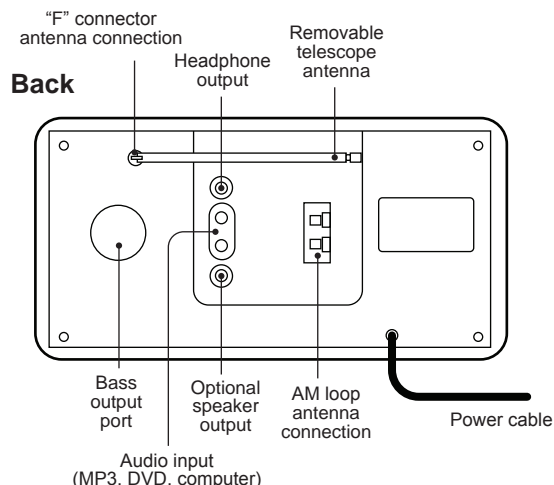
### Front



Radio Buttons including:

- Standby: turn on and off the unit.
- Display: select different display information.
- Mode: select between AM, FM and AUX mode.
- Menu: select between different functions, i.e: HD scan, auto preset, clock, and alarm.
- Presets 1-10: memorize favorite radio stations.
- Shift: press to select preset 6-10.

### Back



# *a classic sound*

## *IN THE DIGITAL AGE*

### Specification list

Amplifier	2x20 Watts solidstate
Preamp	vacuum tube equipped 2 x 6N3
Drivers	4" composite mid/bass, 1" tweeter
Impedance	4Ohms
Frequency response	40 HZ -18kHz
Inputs	iPod dock, 1/8" auxiliary
Outputs	1/8" stereo
Speaker enclosure	1/2" MDF with tuned bass reflex port
Height	speaker 8.00" / preamp 3.75"
Width	speaker 4.75" / preamp 8.00"
Depth	speaker 10.00" / preamp 6.00"

### Active Speaker System

- Built in 2x20 Watt solid state amplifier
- 4" mid/bass driver and 1" dome tweeter for full dynamic range
- Solid constructed wood acoustic structure enhances the audio quality
- Bass reflex port for increased bass response
- 1/8" audio in.out connectors for preamplifier
- audio cables included

### iPod tube preamplifier

- True, audiophile quality music
- iPod charging
- Video output for use with Video iPods
- Remote control functions include: volume control, mute, next/previous track, play/pause
- Dual 6N3 tubes for a warm analog sound
- iPod compatible docking station
- Auxiliary input for additional audio devices such as computers, and non-Apple MP3 players.



## FAQs Before Purchasing the iTPA-220

### Other than playing my iPod's music library, does the iTPA-220 system offer any other cool features?

The preamplifier has an 1/8" audio input for any additional audio device to play through a great sound system. There is also a video output on the preamplifier for use with 5th generation Video iPod models.

### What kind of iPod controls does the iTPA-220 offer other than controlling the iPod directly?

The iTPA-220's preamplifier has a centered knob for volume control and there is also a remote control included with the system that allows for volume control, track changing, play/pause, and mute to be controlled/adjusted.

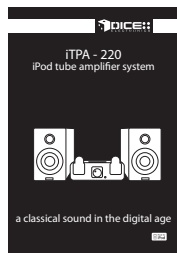
### Are the vacuum tubes just for display on the preamplifier, or are they actually functional?

The dual 6N3 vacuum tubes are functional and the reason the audio quality has such a rich and warm tone.

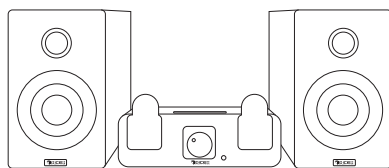
### Is charging supported with the newer iPod models?

The 5V (USB) charging is currently not supported with this system. This includes 4th generation Nano, 2nd generation Touch, and 3G iPhone. All other iPod models DO charge. Please inquire about the availability of a converter module.

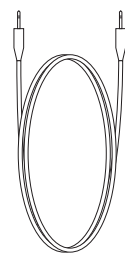
## iTPA-220 Content Identifier



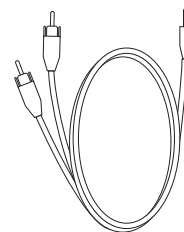
user manual



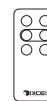
iTPA-220 unit  
(2 Speakers & 1 Vacuum tube preamplifier)



mini-jack to  
mini-jack cable

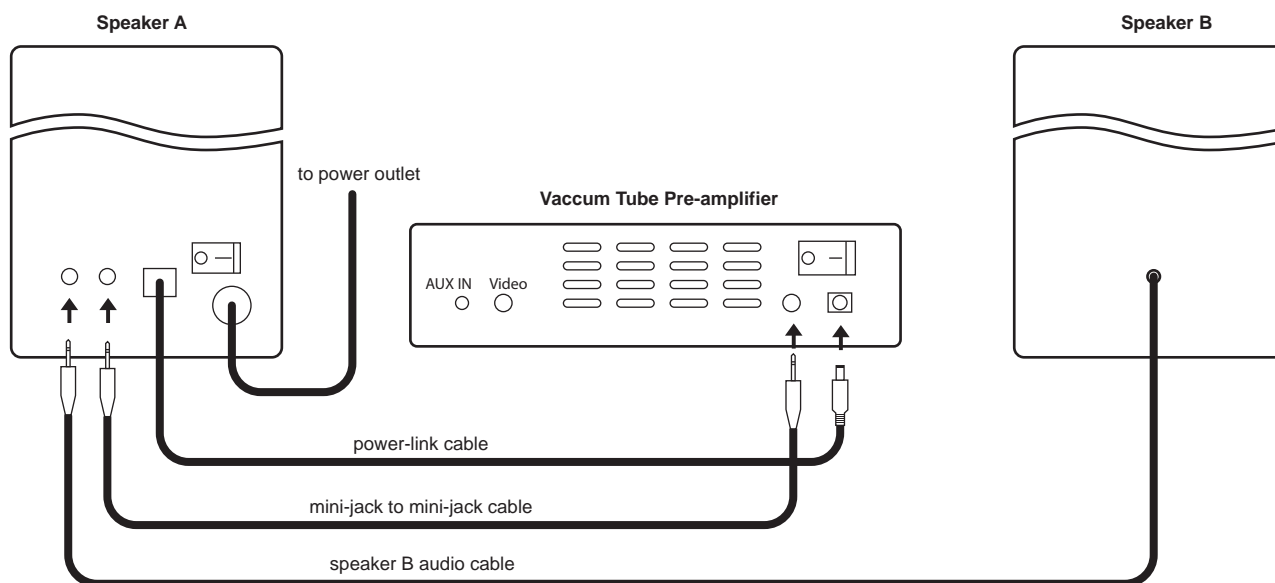


RCA to mini-jack  
cable



remote control

## Connection Diagram



# Cheers to a richer, warmer sound of tomorrow.

The iTPA-220 fills your home with great audiophile sound and its classic retro design accents any décor. This vacuum tube amplifier system takes you back in time while using today's and tomorrow's digital technology.



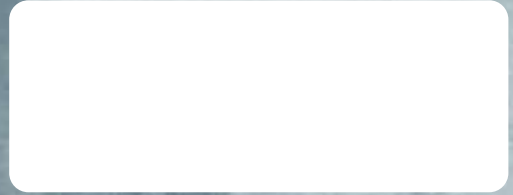
[www.diceelectronics.com](http://www.diceelectronics.com)  
888.342.3999

## iTPA-220

Vacuum Tube Amplifier System for iPod



Authorized Dealer



Although every effort is made to insure compatibility, this guide/catalog is not guarantee for suitability in all applications. Please consult your dealer for information on additional accessories and product specifications. DICE Electronics, LLC. believes the information in this document to be correct at the time of printing. However, availability, pricing, specifications, features and appearance are subject to change without notice. All trademarks, registered trademarks and copyrights belong to their respective owners.

Copyright 2009 DICE Electronics, LLC. All Rights Reserved. Volume 1, Q1/09